URBAN LAKES
WATER QUALITY ASSESSMENT

LAKE AQUITAINE AND
LAKE WABUKAYNE
(CITY OF MISSISSAUGA)

DATA REPORT SUMMARIZING
THE YEARS 1977-1986

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URBAN LAKES WATER QUALITY ASSESSMENT

LAKE AQUITAINE AND LAKE WABUKAYNE,

(CITY OF MISSISSAUGA)

DATA REPORT SUMMARIZING THE YEARS 1977-1986

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PREFACE

The data presented in this report were collected by staff of the Water Resources Branch of the Ontario Ministry of the Environment as part of the Urban Lakes Study. This data report is intended as a readily available source of information for the two urban lakes (stormwater reservoirs), Aquitaine and Wabukayne located within the city of Mississauga.

The data are expected to be useful for the evaluation of future change in the limnology of these lakes as development within their catchments is modified over time.

ABSTRACT

The physical and chemical characteristics of Lakes Aquitaine and Wabukayne, two urban, man-made, stormwater fed lakes are presented for the ice-free periods of the years 1977 to 1986. Raw data and annual means are summarized in tabular form. Several key variables are presented in graphic form. A short summary describes the eutrophic and turbid nature of the two lakes. Maximum summer surface temperatures ranged between 22 and 26 °C. Low oxygen levels were recorded in the bottom waters of both lakes. High turbidity levels corresponded with construction and dredging activities (a maximum of 77 FTU in Lake Aquitaine). Urbanization deteriorates receiving water quality and as watershed imperviousness increases with development, runoff in the drainage area deteriorates in water quality as well. Ratings of imperviousness are currently 60% in both basins. Conductivity and chloride levels have been increasing as the watersheds have urbanized. Nutrient concentrations increased in both lakes during the spring and fall wet season and during occasional summertime rain events. Total phosphorus (TP) values of over 0.1 mg/L were not uncommon. Soluable reactive phosphorus concentrations were approximately one half to one third of the TP values. Chlorophyll a values frequently exceeded 20 μg/L. The Lake Aquitaine, sedimentation basin and lake combination, appears to offer better reductions in nutrients and solids loadings to the downstream waters than does the Lake Wabukayne system.

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INTRODUCTION

Lakes Aquitaine and Wabukayne are man-made, stormwater fed lakes located in urban settings in the City of Mississauga, Ontario (Figure 1).

The larger of the two lakes, Lake Aquitaine, was created by excavating a former farm field and channelling all surface runoff toward the depression. The lake has a maximum depth of 5.0 metres and a bank slope at the shoreline of 4:1. Construction was completed in the spring of 1977. The three part design integrates a concrete inlet basin (to capture floating oils and debris), a sedimentation basin and the main body of the lake. A perforated cement-surface skimming weir (Figures 2 and 3) separates the basin from the main lake. The basin has a retention time of approximately 17 days. 28% of the basin is currently filled (Alzaru, pers. comm).

The lakes retention time is on average 329 days. Lake outflow is directed through a morning glory spillway with bottom draw facilities allowing water to discharge to the Credit River system. Inflow occurs through a single 6 square meter conduit (Brydges and Robinson 1980). The lake is designed to accomodate a 100-year-flood with berms surrounding the lake and a gabion weir which could direct waters to a swale and into a channel that leads to the Credit River. Land development in Lake Aquitaine's drainage basin continued through 1986 (Alzaru, pers. comm), (Table 1a). Other lake and sedimentation basin characteristics are presented in Table 1.

The lake was stocked with approximately 4,000 rainbow trout (Salmo gairdnerii) between the years 1977 and 1979. In addition, several species of fish including pumpkinseed (Lepomis sp.), and rock bass (Ambloplites rupestris) have been caught in the lake by local anglers, and appear to be well established.

Nuisance shoreline accumulations of Cladophora (a filamentous algae) were observed within two years of filling the lake and experimental treatments of shoreline plots with the algicide Cutrine Plus (copper sulphate) were conducted during the summer of 1981. These treatments proved to be ineffective (Michalski 1983). Alteration of the shoreline habitat by covering it with a sand substrate has however proven to be an effective long term control strategy, mitigating the accumulations of cladophora. But, raking and removal of Cladophora by the local parks department continues, where a sand substrate was not practical, and pebbles and stones predominate.

Lake Wabukayne's design is similar utilizing a sedimentation basin to protect the lake from turbid inflow (Figures 2 and 3). There are several contrasts between the two lake designs.

The weir used to form the sedimentation basin in Lake Wabukayne is a simple gabion wall. The wall is comprised of 10 to 15 cm stones enclosed in a wire basket approximately 0.67 m wide which rises just below the water surface. Sediments are filtered in their way through the weir. Efficiency declines through time as it becomes plugged allowing more and more water over the top. The site was originally a farm pond (Cook's Pond) in the valley of Wabukayne Creek which was drained and lined with clay. The

original earth dam was removed in 1976 and a larger concrete spillway and dam was constructed, to control water volume and flow. The banks are steep with an average slope of 2:1. Lake Wabukayne was drained in March 1980 to facilitate silt removal and reconstruction of the gabion weir. Prior to 1980 the gabion weir extended to only 1 meter below the water surface. The lake was allowed to refill in May 1980.

In contrast to Lake Aquitaine Lake Wabukayne is much smaller with a retention time of only 17 days, approximately equal to the retention time of Lake Aquitaine's sedimentation basin. But, it accepts runoff from a mainly residential drainage basin (consisting of detached and semi-detached homes) over four times as large as Lake Aquitaine's, and has a Lake Equivalent volume / drainage area of 7 while Lake Aquitaine's is 168. The physical characteristics of both lakes are compared in Table 1.

Both lakes are fed by underground pipes draining an urban watershed and were designed primarily as aesthetic enhancements to surrounding subdivisions and to control downstream water quality. All inflow is rain event driven. No quantitative data is available. The base flow to both lakes is created through runoff from urban water uses (swimming pool draining, cleaning, landscaping, etc.). To supplement low summer flows and to offset evaporation, municipal water supplies have been incorporated into their designs (Brydges and Robinson 1980). These are opened by municipal staff only if necessary to maintain minimum lake levels and have been rarely used. The water is directed into the sedimentation basin where it would de-chlorinate by exposure to the atmosphere prior to reaching the main lake. Potential effects on biota are unknown but flow augmentation may enhance lake trophic status through dilution.

Lakes Aquitaine and Wabukayne are surrounded by grassed and treed parklands that offer the public a variety of land based recreational activities. While body contact water based recreation is not permitted, paddleboating, canoeing and smallcraft sailing are practised.

Preliminary findings from the two lakes were reported by Brydges and Robinson (1980). This report summarizes the water quality data for Lakes Aquitaine and Wabukayne and the water quality characteristics for their respective inflow and outflow waters in table format during the ice-free periods of the years 1977-1986.

METHODS

Samples were collected weekly from May to September between the years 1977 to 1981, bi-weekly during 1983 and 1984 and approximately monthly in 1982, 1985 and 1986.

Samples were collected at four sites in Lake Aquitaine and 6 sites in Lake Wabukayne (Figure 2).

Water samples collected from the inlets and outlets of both lakes were collected as grab samples, by filling the sample bottles directly, from the flowing water at each site.

In Lake Wabukayne, the combined flow from the main inlet to the lake was collected as one sample during the years 1977, 1978 and 1979. Since 1980 two discrete

samples have been collected, the north inlet and the south inlet. In 1980, the gabion wall forming the sedimentation basin was extended to the water surface by adding an additional row of gabion baskets. Since the basin is defined by a submerged barrier, samples representative of the outlet from the sedimentation basin (Inlet Below Basin) were collected mid-lake and 1 meter downstream from the weir.

At the main station of each lake (the deepest point of the lake), samples were collected as euphotic zone composites by lowering and raising a weighted, narrow mouthed 1 litre glass bottle through the euphotic zone so that it filled just as it reached the surface. The euphotic zone was defined as twice the observed Secchi disc depth (to a maximum depth of 1 meter off lake bottom). Additional samples were retrieved from 1 meter off bottom using a 6 litre capacity PVC Van dorn bottle. Samples designated for chlorophyll analyses were stabilized with a 2% by weight $MgCO_3$ solution to help prevent degradation of the chlorophyll pigments.

Oxygen and temperature profiles were taken at the main station using a YSI Model 57 combined oxygen and temperature meter. Meter accuracy for oxygen measurements was verified by calibration using the modified winkler titration (APHA 1976). Temperature accuracy was checked with a hand held mercury thermometer.

Samples for all other chemical analyses were unpreserved, but submitted to the Ministry of the Environment laboratories within three hours of collection and analyzed according to standard methods (Ontario Ministry of the Environment, 1981).

RESULTS

Temperature and Oxygen

Temperatures in both lakes typically reach their maxima in mid-July to early August. Maximum summer surface temperatures normally range between 22.0 to 26.0 degrees Celsius.

The highest temperatures on record were observed in 1982 with a peak temperature of 28°C in Lake Aquitaine and 30°C in Lake Wabukayne.

The lakes are stratified during the summer months and fall turnover usually take place in September (Figures 5a, 5b, 7a, 7b).

Lake Aquitaine did not exhibit an anoxic hypolimnion during its first three years, but, since 1980 and each subsequent year, hypolimnetic oxygen was usually depleted by July (Figure 6a, 6b).

The shallow waters of Lake Wabukayne (Table 1) did not usually experience anoxic periods but low oxygen levels were common to bottom waters during the years 1982, 1984 and 1986 (Figure 8a, 8b).

Turbidity and Suspended Solids

Seasonal euphotic zone turbidity is variable and appears to be positively correlated to rainfall, which usually is heaviest in the spring and fall. Correspondingly, the highest turbidity levels (Formazin turbidity units) (FTU) in both lakes typically occurred during these seasons (Figure 11).

Turbidity in Lake Aquitaine was highest in April 1977, the first year following construction of the lake with the highest levels on record (77 FTU). Exceptionally low, inflow turbidity levels, measured at that time (Table 4b), suggest that the elevated levels were a result of lake construction activities.

Similarly, extremely high turbidity was measured in Lake Wabukayne in 1977 and 1981 following construction and sedimentation basin dredging. During these years, mean annual levels exceeded 40 FTU.

Lake Wabukayne mean annual turbidity ranged between 13.4 to 44.5 FTU while turbidity in Lake Aquitaine did not exceed 15.8 FTU on a mean annual basis (Tables 2a, 3a).

Turbidity levels appear to have peaked in 1981 and since that time have displayed a downward trend (Figure 14), which is probably related to the cessation of major construction and development, in both drainage basins.

Both of these lakes may serve to protect downstream water quality by settling sediments and other pollutants. Lake Aquitaine, primarily due to an extended retention time clearly outperforms Lake Wabukayne in this apsect of their designs.

Correspondingly, suspended solids (and as mentioned previously turbidity) levels are also much higher in Lake Wabukayne (annual means 9.0 - 30.0 mg/1) than in Lake Aquitaine (annual means 2.0 -11.0 mg/1) due to heavy suspended solids loadings from its combined inflows (Table 3c). Lake Aquitaine was better able to reduce solids to outflow waters. In 1982 mean annual loadings averaged 281.7 mg/1 (Table 2c) and were reduced to 6.5 mg/1 at the outlet (Table 2e). In contrast, solids levels in Lake Wabukayne outflow water (Table 3h) would occasionally be higher than inflow measurements (Tables 21 through 23). Mean annual solids levels in outflow waters from Lake Wabukayne ranged between 7.9 and 31.5 mg/L, and between 1.5 and 9.8 mg/L in Lake Aquitaine.

Conductivity and Chloride

Conductivity in Lakes Aquitaine and Wabukayne appears to be increasing each year (Figure 13). Mean annual levels in Lake Aquitaine ranged between 502 and 1536 μmhos/cm (Table 2a) while values in Lake Wabukayne ranged between 434 and 807 μmhos/cm (Table 3a).

This may be a result of increased road salting in the area as roads and shopping mall paved areas were completed. A similar trend is exhibited by chloride levels (Figure 13).

Conductivity and chloride levels are highest in inflow samples peaking in the early season and tend to decrease as the summer progresses (Figure 10).

Conductivity levels in Lake Aquitaine may be higher than those in Lake Wabukayne due to Lake Aquitaine's basin containing a higher percentage of industrial and commercial landuses. This type of landuse exerts additional stress on Lake Aquitaine from additional winter salting and sanding associated with its vast paved areas.

Nutrients

Phosphorus concentrations in the euphotic zone of both lakes, Aquitaine and Wabukayne, have a tendency to peak in the spring or fall of each season. These peaks may be related to an increase in nutrient rich runoff due to heavier rains at these times of the year. Summer storms may also result, however, in an increased runoff period which in turn could have precipitated the nutrient spikes occasionally measured in mid-summer (Figure 9).

Mean annual total phosphorus (TP) and soluble reactive phosphorus (SRP) concentrations in Lake Wabukayne peaked in 1981, 0.158 mg/L and 0.071 mg/L respectively, and have since been declining (Table 3a, Figure 12).

In Lake Aquitaine, TP levels increased from 1977 to reach their highest levels in 1981 (0.069 mg/L). Unlike Lake Wabukayne however, concentrations appear to have plateaued and have not indicated a trend to lower levels more typical of the first three years

of the lake's existence. SRP values also peaked in 1981 (annual mean - 0.020 mg/L). But, within a two year period, they fell to levels typical of 1978/79 and may have attained a steady state (Table 2a, Figure 12).

No significant annual trends (mean annual euphotic zone) for any of the nitrogen parameters tested are apparent in either of the two lakes. Seasonal nutrient depletions indicative of algal nutrient uptake are present, particularly for nitrates. The extent of the depletions fluctuate in degree from year-to-year.

Inflow concentrations for ammonia tend to decrease by mid-summer as well and combined with algal uptake are reflected in lower euphotic zone ammonia concentrations. These effects are more prevalent in Lake Aquitaine but do occur to some degree in Lake Wabukayne.

In general, outflow concentrations of most nutrients are greatly reduced compared to inflow concentrations in Lake Aquitaine, but this is not usually the case in Lake Wabukayne.

Chlorophyll levels in Lake Wabukayne increased as the reservoir aged, but this trend was not as clear in Lake Aquitaine (Figure 15). Mean annual chlorophyll a measurements were generally higher in Lake Wabukayne, reaching 33.0 μg/1 in 1985 (Table 3a), increasing from a low measurement of 6.8 μg/1 observed in this lake's second year of existence. This trend was not as apparent in Lake Aquitaine (Table 2a), but a historical maximum of 14.5

μg/1 was recorded in this lake also in 1985. Chlorophyll minima of 6.0 and 3.4 μg/1 were measured in the second and third years respectively.

Secchi disc values are lower in Lake Wabukayne with a maximum annual mean over the period of the study of 1.4 m (Table 3a). Mean annual Secchi disc readings in Lake Aquitaine ranged between 0.93 and 3.8 m (Table 2a).

Lake Aquitaine and Lake Wabukayne are well buffered hardwater lakes. Mean annual pH ranged between pH 7.9 to pH 8.6 for Lake Aquitaine, and pH 7.6 to pH 8.2 for Lake Wabukayne. Alkalinity levels were higher in Lake Wabukayne with mean annual levels between 93 mg/L to 136 mg/L compared with Lake Aquitaine alkalinity between 71 mg/L to 90 mg/L.

CONCLUSIONS

Lake Aquitaine and Lake Wabukayne are eutrophic hardwater lakes that experience particularly turbid inflowing waters high in suspended solids. The Lake Aquitaine design is significantly more effective at reducing nutrient and solids loadings to the receiving waters than the Lake Wabukayne design, primarily a result of its extended retention time. Outflow and inflow concentrations of most indicator parameters in Lake Wabukayne often exhibit little difference.

Conductivity and chloride levels are particularly high in the early season but tend to decline as the summer season progresses. Mean annual levels have been steadily increasing in both watersheds.

Nutrient peaks are probably most related to increased runoff during heavy periods of precipitation. The drainage basins for both lakes are heavily urbanized, as such runoff is heavy, and reaches the lakes quickly, even after a light rainfall. Consequently, spring and fall periods of high nutrient and turbidity levels are frequent. The hypolimnetic waters of both lakes are known to become anoxic. In Lake Wabukayne these periods are short-lived and infrequent due to the shallow nature of the lake. In Lake Aquitaine, bottom waters typically contain less than 1 mg/L oxygen, usually from mid-June to fall turnover.

RECOMMENDATIONS

1) The authors have witnessed the misuse of stormsewers by the public, who have used them for convenient disposal of oils and household wastes. A public information program directed to all households in the drainage basin, perhaps including such items as permanent stickers to be displayed in the home (for the benefit of future residents) is recommended.

2) Contaminants such as greases and phenols as well as general bacterial conditions should be included in future assessments because of the urban and industrial nature of the watershed.

3) High sediment loads from urban watersheds necessitate sedimentation basins with an extended retention time. Sizing of these basins is extremely important to ensure protection of downstream water uses. Regular removal of sediment within these basins should be practised.

4) Sandy nearshore substrate is recommended, to limit suitable Cladophora sp. habitat. Artificial circulation could be incorporated to eliminate bottom water anoxia and limit sediment nutrient regeneration, however solids settling may be reduced and main lake turbidity could increase with this treatment.

5) A healthy nearshore macrophyte community should be established within the sedimentation basin and in areas around the lake to promote nutrient uptake, shading and assist in the establishment of a diverse biota.

6) In future urban stormwater lake planning, the direction of prevailing winds should be determined and lake design adjusted to enhance lake circulation, which would also direct floating algae and debris away from areas of intense public use.

7) The use of treated municipal water supplies to maintain lake levels should be discouraged in new designs.

8) More detailed data should be collected with respect to rainfall and effects on stormwater reservoir retention times and resulting water quality.

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Table 1: Characteristics of the impoundment lakes.

	Aquitaine	Wabukayne
Lake Area (ha)	4.7	2.0
Lake Volume (m^3)	1.8×10^5	3.2×10^4
Mean Depth (m)	3.8	1.6
Maximum Depth (m)	5.0	2.9
Sedimentation Basin Area (ha)	0.38	0.27
Sed. Basin Volume (m^3)	11,400	n/a
Sed. Basin Mean Depth (m)	1.4	n/a
Sed. Basin Max. Depth (m)	3	n/a
Lake Retention time (days)	329	13
Sedimentation Basin Retention time (days)	17	.55

Table 1a: Changes in land use characteristics between 1977 and 1989 of the Lake Aquitaine and Lake Wabukayne watersheds. Data presented as a % of total drainage basin area (*).

	Lake Aquitaine		Lake Wabukayne	
	1977	1989	1977	1989
Single family residential	16.5	56.4	12	62
Townhouses	16.2	19.1	3.6	9.2
Apartment Bldgs.	3.4	11.3		9.3
Shopping Plazas	1.8	5.5		6.2
Light Industrial				1.0
School				1.2
Park	4.0	6.2		8.9
Open/Agricultural	38.7		41.5	
Under Construction	19.3	1.3	43.0	1.3

*1986 data unavailable, 1989 data presented. Determined from aerial photos.

Table 2a: Lake Aquitaine: Mean annual concentrations for lake station samples taken as composites through the euphotic zone (1977-1986).

	#	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus		Nitrogen				TC	TOC	TIC	Chlorophyll			Secchi disc
									TP	FRP	NH_3	TKN	NO_2	NO_3				a	b	Acidified a	
1977	23	8.00	632	15.8	10.40	102.0	81.0	54.0	.039	.019	.069	.620	.030	1.191	26.0	7.0	19.0	-	-	-	1.30
1978	17	8.47	784	2.8	3.80	183.0	[1]74.0	[1]43.3	.036	.002	.079	.070	.022	.140	[2]22.7	[2]5.6	[2]17.1	6.0	-	-	2.70
1979	15	8.47	1015	1.9	2.00	237.0	80.0	42.8	.023	.001	.025	.610	.012	.383	23.5	4.7	18.2	3.4	-	-	3.80
1980	13	8.55	923	6.6	7.82	211.7	79.8	43.1	.045	.005	.080	.756	.007	.074	24.1	6.25	18.3	11.2	-	-	1.09
1981	13	7.90	1076	12.1	11.00	253.0	90.0	47.1	.069	.020	.124	.780	.048	<.213	-	4.4	21.3	8.5	2.6	6.4	0.73
1982	4	8.19	829	10.7	5.99	175.5	88.8	57.2	.046	.013	.138	.630	.009	.100	-	3.6	21.1	10.6	1.1	8.6	0.93
1983	9	8.39	502	8.3	8.70	75.1	86.2	50.9	.035	.003	.064	.510	.005	.084	-	4.0	19.9	6.2	1.2	4.9	0.98
1984	11	8.40	873	8.9	7.78	174.3	85.7	53.4	.038	.005	.069	.690	.013	.186	-	4.4	20.2	9.2	2.1	4.5	0.98
1985	5	8.45	942	13.1	[1]7.50	186.5	80.3	21.3	.060	.002	.116	.910	.018	.307	-	4.5	18.7	14.5	2.2	10.0	0.72
1986	4	[1]8.44	1536.7	7.2	7.55	350.9	[1]71.0	49.8	.046	.005	.095	.763	.019	.326	-	3.6	16.3	11.3	3.0	8.8	1.30

1. n = 3
2. n = 4

1022A.1

Table 2b: Lake Aquitaine: Mean annual concentrations for lake station samples take from 1m above the bottom (1978-1986).

	#	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO.	Phosphorus		Nitrogen				Carbon			Fe	Na	K
									TP	FRP	NH_3	TKN	NO_2	NO_3	TC	TOC	TIC			
1978	17	8.24	792.0	3.44	4.10	180.0	[1]82.7	[1]42.2	.038	.004	0.102	0.80	.011	.208	[2]24.2	[2]5.5	[2]18.8	[1].080	-	-
1979	6	8.49	971.7	2.10	2.45	227.0	79.5	42.8	.019	.002	0.039	0.58	.005	.056	22.9	12.6	17.9	.095	141.8	4.39
1980	13	7.87	971.5	7.50	7.00	202.0	95.1	40.5	.051	.004	0.313	1.03	.007	.071	29.5	5.6	23.8	.360	130.3	4.63
1981	13	7.75	1148.0	10.40	13.00	263.6	105.0	42.6	.075	.016	0.217	1.07	.027	.498	-	4.3	26.7	.840	157.0	4.90
1982	4	7.64	968.2	9.65	8.15	212.8	118.4	52.9	.048	.007	0.350	0.90	.008	.159	-	4.1	27.5	.576	121.3	5.33
1983	9	7.76	545.1	8.86	12.10	80.6	112.2	44.8	.055	.004	0.236	0.804	.040	.086	-	4.0	28.3	.394	49.3	3.64
1984	11	8.03	1142.2	12.59	8.62	193.3	126.1	47.3	.051	.004	0.312	0.923	.012	.149	-	5.2	28.8	.384	121.7	4.46
1985	5	7.86	1006.0	19.60	15.85	214.0	122.6	27.9	.057	.007	1.140	1.87	.011	.192	-	4.4	30.2	.475	126.9	4.44
1986	3	[1]7.89	1246.0	9.18	9.43	392.4	[1]112.1	43.6	.064	.002	0.683	1.57	.014	.230	-	3.3	25.0	.328	241.0	4.58

1. n = 3
2. n = 4

1022A.2

Table 2c: Lake Aquitaine: Mean annual concentrations for samples collected from the inlet above the sedimentation basin (1977-1986).

	#	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus		Nitrogen				Carbon			Fe	Na	K
									TP	FRP	NH_3	TKN	NO_2	NO_3	TC	TOC	TIC			
1977	24	8.12	445.0	87.9	56.7	41.1	86.0	[1]52.0	.204	.087	.151	1.15	.079	1.180	30.0	11.0	20.0	[1]3.860	[1]18.3	[1]8.20
1978	17	7.94	518.5	10.0	10.7	74.0	[2]99.0	[2]59.7	.168	.076	.546	1.70	.086	0.587	[2]35.4	[2]11.8	[2]23.4	-	-	-
1979	15	8.35	486.8	9.3	10.2	73.0	75.2	42.8	.103	.030	.115	1.18	.078	0.533	26.5	9.7	16.8	0.380	37.9	4.77
1980	13	8.35	617.0	7.3	12.0	100.0	91.1	48.9	.156	.052	.223	1.27	.068	0.648	27.8	6.7	21.1	0.587	54.8	3.92
1981	15	7.89	840.0	55.6	52.0	175.8	120.7	56.9	.298	.176	.278	1.72	.065	1.090	-	6.2	24.1	0.913	101.8	5.62
1982	4	7.65	635.3	194.9	281.7	74.9	137.2	79.0	.381	.048	.136	1.75	.026	0.667	-	4.5	31.6	1.180	39.6	8.36
1983	9	6.41	499.2	68.3	74.9	42.5	135.9	62.1	.232	.087	.185	0.91	.086	0.627	-	4.9	33.6	4.120	26.7	6.37
1984	11	8.00	700.5	55.9	[1]120.4	81.2	148.6	82.1	.310	.069	.136	1.68	.184	1.070	-	10.8	34.0	5.980	45.7	8.52
1985	5	8.18	838.2	18.8	5.9	112.87	170.4	86.8	.137	.069	.251	1.09	.067	0.852	-	5.5	39.4	0.655	61.8	5.46
1986	4	8.31	1028.0	24.7	19.2	364.37	149.9	88.6	.136	.020	.214	1.42	.097	0.884	-	5.4	30.8	0.827	213.3	5.75

1. n = 10
2. n = 3
3. n = 4

1022A.3

Table 2d: Lake Aquitaine: Mean annual concentrations for samples collected from the inlet below the sedimentation basin (1977-1986).

	#	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus TP	Phosphorus FRP	Nitrogen NH_3	Nitrogen TKN	Nitrogen NO_2	Nitrogen NO_3	Carbon TC	Carbon TOC	Carbon TIC	Fe	Na	K
1977	23	8.09	391.0	85.60	48.1	41.0	81.0	[1]46.0	.200	.085	.183	1.10	.067	1.145	29.0	11.0	18.0	[3]5.56	[3]18.8	[3]7.70
1978	17	7.97	526.0	6.80	8.0	83.0	[1]92.0	[1]46.0	.156	.083	.637	1.78	.062	.491	[2]32.9	[2]12.3	[2]21.2	-	-	-
1979	15	8.32	489.0	9.00	9.8	77.1	75.2	39.7	.104	.020	.200	1.39	.076	.518	25.9	7.9	17.9	0.46	36.6	4.79
1980	13	8.39	576.0	7.10	12.6	103.1	82.5	42.3	.136	.018	.187	1.21	.055	.498	26.0	7.1	18.9	0.61	60.8	3.93
1981	15	7.97	882.7	25.24	27.6	178.4	91.7	51.4	.416	.153	.335	1.37	.094	.873	-	5.9	21.5	3.80	89.8	6.24
1982	4	7.86	500.8	21.43	14.0	55.2	106.2	64.3	.103	.035	.249	0.94	.040	.568	-	5.0	24.2	1.25	30.3	6.60
1983	9	7.89	436.0	45.70	39.7	39.7	95.3	53.7	.125	.031	.219	0.96	.053	.158	-	4.7	26.5	2.30	25.3	5.41
1984	11	8.10	511.6	42.20	29.0	59.4	95.2	60.0	.118	.025	.103	1.18	.066	.128	-	8.0	22.8	1.82	34.3	6.14
1985	5	8.39	798.2	20.10	12.5	144.3	103.8	49.8	.092	.018	.198	1.32	.041	.462	-	6.5	24.5	0.55	90.4	4.62
1986	4	8.45	1224.7	13.27	12.1	347.6	75.9	50.0	.052	.004	.118	0.83	.023	.376	-	3.6	17.1	0.56	212.3	4.43

1. n = 3
2. n = 4
3. n = 9

1022A.4

Table 2e: Lake Aquitaine: Mean annual concentrations for samples collected from the outlet (1977-1986)

	#	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus		Nitrogen				Carbon			Fe	Na	K
									TP	FRP	NH_3	TKN	NO_2	NO_3	TC	TOC	TIC			
1977	3	7.98	505	17.1	5.8	76.0	-	-	.045	.024	.034	.580	.015	1.240	25.0	5.0	20.0	-	-	-
1978	9	8.41	794	2.6	3.4	179.0	-	-	.032	.006	.101	.720	.013	0.246	[1]23.8	[1]6.2	[1]17.8	-	-	-
1979	12	8.40	1018	1.7	1.5	238.0	78.5	42.6	.022	.004	.030	.633	.017	0.402	22.6	4.8	17.8	.070	144.0	4.51
1980	13	8.64	923	6.7	6.2	219.0	78.4	43.6	.038	.003	.065	.691	.006	0.068	24.6	5.8	18.0	.310	125.4	4.43
1981	14	8.06	1086	17.5	8.1	251.6	88.6	46.5	.084	.039	.104	.710	.020	0.197	-	4.4	21.0	.630	155.2	4.92
1982	4	8.33	766	6.3	6.5	177.5	87.4	58.4	.042	.008	.112	.590	.008	0.096	-	3.7	19.0	.352	101.4	5.30
1983	9	7.40	463	14.1	8.4	73.1	82.3	47.6	.072	.006	.061	.716	.066	0.213	-	5.1	18.5	.263	43.0	4.02
1984	11	8.27	889	9.0	6.2	179.6	89.2	51.4	.031	.003	.091	.645	.013	0.184	-	4.2	19.6	.271	113.7	4.44
1985	4	8.53	888	14.9	9.8	191.5	81.5	40.2	.048	.003	.134	.947	.016	0.325	-	4.4	18.9	.269	112.6	4.31
1986	4	8.55	1244	8.4	7.6	348.4	69.5	50.9	.034	.003	.048	.667	.019	0.312	-	3.3	15.8	1.537	217.3	4.35

1. n = 2

Table 3a: Lake Wabukayne: Mean annual concentrations for lake station samples taken as composites through the euphotic zone (1977-1986).

	#	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus		Nitrogen				TC	TOC	TIC	Chlorophyll			Secchi disc
									TP	FRP	NH_3	TKN	NO_2	NO_3				a	b	Acidified a	
1977	22	7.96	434	40.6	[2]13.8	[2]36.2	93.0	[2]59.0	.071	.038	.087	0.800	.052	1.360	31.0	10.0	21.0	-	-	-	0.85
1978	17	8.22	610	11.9	12.6	82.5	-	-	.037	.005	.060	0.750	.027	0.341	[1]37.4	[1]9.5	[1]27.7	6.8	-	-	1.40
1979	14	7.87	604	15.4	10.8	73.6	130.2	57.2	.068	.010	.084	0.99	.041	0.500	35.8	6.9	28.9	22.5	-	-	0.90
1980	12	8.05	456	15.3	9.0	50.1	96.4	50.1	.074	.015	.160	0.82	.065	0.641	31.3	6.5	23.8	7.2	-	-	1.23
1981	13	7.88	637	44.5	26.9	89.2	106.2	74.3	.158	.071	.101	1.01	.033	1.670	-	5.2	25.5	16.4	1.8	13.5	0.32
1982	4	7.79	668	27.9	17.1	81.3	135.8	66.4	.110	.047	.067	0.94	.035	2.289	-	5.6	32.3	15.9	3.6	11.3	0.62
1983	9	7.64	509	28.3	30.0	44.6	112.1	69.3	.112	.035	.269	0.98	.159	0.755	-	5.6	28.6	12.4	3.0	11.9	0.45
1984	11	8.03	584	31.1	28.0	69.1	114.5	66.6	.126	.020	.184	1.33	.065	0.927	-	6.3	27.3	25.4	7.0	22.6	0.49
1985	4	8.05	740	27.8	20.5	111.2	126.4	69.1	.108	.013	.234	1.22	.061	0.858	-	5.8	30.6	33.0	5.3	[3]29.7	0.51
1986	4	8.10	807	13.4	11.7	187.6	134.2	82.3	.071	.021	.211	0.91	.061	1.047	-	4.8	33.4	14.6	2.3	10.0	1.33

1. n = 4
2. n = 8
3. n = 3

1022A.11

Table 3b: Lake Wabukayne: Mean annual concentrations for lake station samples collected from 1m above the bottom (1978-1986).

	#	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus TP	Phosphorus FRP	Nitrogen NH_3	Nitrogen TKN	Nitrogen NO_2	Nitrogen NO_3	Carbon TC	Carbon TOC	Carbon TIC	Fe	Na	K
1978	5	8.26	673.0	13.1	11.5	89.6	-	-	.058	.007	.066	0.93	.030	0.682	[1]42.0	[1]8.2	[1]33.8	-	-	-
1979	14	7.74	637.0	11.0	11.4	77.2	147.0	58.2	.075	.011	.106	0.99	.042	0.522	40.1	6.8	33.4	1.42	35.2	5.63
1980	12	7.93	451.0	17.3	9.5	48.7	94.2	48.8	.078	.032	.183	0.83	.070	0.646	29.9	6.4	23.5	0.86	26.7	5.50
1981	13	7.72	634.6	48.6	29.2	87.2	112.6	72.1	.178	.084	.112	0.99	.032	1.640	-	5.2	27.8	3.53	45.4	7.90
1982	3	7.67	762.3	20.8	18.7	94.5	161.9	71.1	.074	.034	.188	0.89	.049	1.620	-	6.2	37.5	0.95	44.8	7.72
1983	9	7.58	519.0	38.3	31.8	55.6	115.6	69.0	.135	.041	.246	1.00	.157	0.936	-	5.3	29.4	2.03	29.0	5.74
1984	11	7.99	608.0	29.0	23.4	67.7	120.9	65.8	.108	.031	.206	1.11	.075	0.735	-	6.2	29.4	0.76	39.3	5.34
1985	4	7.92	767.6	19.0	14.1	113.7	132.2	70.8	.126	.020	.320	1.37	.083	0.858	-	5.9	32.6	0.92	55.3	5.08
1986	4	8.04	872.3	13.1	12.3	262.5	145.8	84.6	.077	.021	.228	0.98	.067	1.052	-	4.2	38.4	0.46	96.7	5.41

1. n = 2

1022A.12

Table 3c: Lake Wabukayne: Mean annual concentrations for samples taken from the mixed water from the north and south inlets (1977-1979).

	#	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus		Nitrogen				Carbon			Fe	Na	K
									TP	FRP	NH_3	TKN	NO_2	NO_3	TC	TOC	TIC			
1977	23	7.91	509	30.0	[3]16.4	[3]45.6	107.0	72.0	.060	.026	.063	0.75	.048	1.430	33.0	9.0	24.0	2.17	23.6	6.9
1978	18	8.18	736	9.9	12.6	99.0	[2]161.0	[1]101.0	.050	.007	.038	0.80	.024	0.597	45.2	7.4	37.9	0.52	-	-
1979	15	7.99	777	18.4	15.4	101.8	169.8	79.8	.089	.021	.100	1.00	.042	0.860	48.9[2]	5.4[2]	43.5[2]	1.42	50.6	6.5

1. n = 3
2. n = 4
3. n = 9

1033A.0

Table 3d: Lake Wabukayne: Mean annual concentrations for samples collected from the north inlet (1980-1986).

	#	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus		Nitrogen				Carbon			Fe	Na	K
									TP	FRP	NH_3	TKN	NO_2	NO_3	TC	TOC	TIC			
1980	13	8.02	735	78.3	87.8	114.0	123.0	87.8	.194	.072	.134	0.96	.106	1.14	35.0	6.13	28.8	3.26	59.4	8.19
1981	15	7.69	1783	2.7	185.7	340.8	213.4	185.7	.788	.562	.185	2.37	.060	4.31	-	4.26	54.7	0.52	178.1	12.80
1982	4	7.54	1312	42.4	158.5	226.3	222.6	158.5	.267	.068	.202	0.463	.043	2.44	-	3.20	46.5	3.33	102.6	8.99
1983	9	7.80	1187	8.0	12.8	180.0	247.0	153.0	.130	.090	.100	0.510	.020	2.26	-	3.00	63.0	0.70	80.0	10.10
1984	11	7.90	1416	15.0	8.8	207.3	250	151.0	.130	.100	.170	1.800	.047	2.56	-	3.40	62.0	0.60	107.0	9.00
1985	4	7.92	1782	2.1	0.9	295.7	283.3	183.8	.089	.071	.104	0.355	.059	2.80	-	2.30	64.7	0.05	136.2	9.49
1986	4	7.94	2010	2.6	3.4	428.0	285.9	167.5	.162	.125	.351	0.725	.218	2.58	-	2.40	62.0	1.26	178.5	9.36

1033A.1

Table 3e: Lake Wabukayne: Mean annual concentrations for samples collected from the south inlet (1980-1986).

	#	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus		Nitrogen				Carbon			Fe	Na	K
									TP	FRP	NH_3	TKN	NO_2	NO_3	TC	TOC	TIC			
1980	12	7.98	540.0	63.3	71.4	46.3	105.6	58.0	.204	.057	.192	0.060	.076	1.07	30.6	5.1	25.4	3.08	35.30	7.28
1981	15	7.89	727.5	137.5	147.3	71.2	181.6	106.9	.221	.040	.025	0.622	.022	2.05	-	3.4	41.8	8.89	36.10	10.60
1982	4	8.02	1110.8	15.3	14.7	135.1	227.1	125.7	.087	.046	.053	0.850	.043	2.86	-	[1]4.3	[1]48.0	0.60	58.07	10.84
1983	9	8.00	948.0	9.0	14.2	87.0	235.3	164.0	.140	.080	.170	0.700	.200	2.30	-	5.0	59.0	1.00	48.00	9.40
1984	11	8.13	1159.0	10.0	5.9	135.6	247.0	151.0	.100	.051	.120	1.600	.050	2.20	-	4.0	60.0	0.80	69.00	7.90
1985	4	8.13	1433.4	2.1	2.0	201.4	266.8	165.0	.081	.075	.226	0.804	.034	2.31	-	2.0	58.6	0.060	99.95	7.44
1986	4	8.27	1635.0	4.0	3.7	281.0	266.7	170.5	.067	.060	.076	0.365	.023	2.27	-	2.1	55.0	0.134	120.25	7.66

1. n = 2 .

1033A.2

Table 3f: Lake Wabukayne: Mean annual concentrations for samples collected from inlet # 2 (1977, 1981-1986).

	#	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus		Nitrogen				Carbon			Fe	Na	K
									TP	FRP	NH_3	TKN	NO_2	NO_3	TC	TOC	TIC			
1977	12	8.10	555.0	81.0	447.0	47.5	-	-	.393	.058	.082	1.80	.235	1.65	54.0	16.0	38.0	-	-	-
1981	15	7.94	835.3	2.4	41.2	106.9	109.9	63.3	.098	.091	.031	0.49	.057	2.38	-	3.6	44.1	0.51	49.3	6.70
1982	4	7.86	832.0	49.0	57.4	116.3	190.2	73.8	.136	.030	.391	1.42	.191	2.62	-	3.6	40.3	2.94	43.2	6.63
1983	9	8.00	789.0	6.0	6.4	94.0	209.4	68.0	.060	.039	.030	0.40	.040	2.20	-	2.9	53.0	5.80	39.0	5.30
1984	11	8.10	798.0	19.0	21.9	96.8	187.1	64.5	.080	.049	.100	0.60	.040	1.91	-	4.0	46.0	0.80	40.0	6.00
1985	4	8.09	1161.5	3.7	1.7	182.2	222.5	86.1	.062	.051	.076	0.35	.023	2.20	-	2.2	50.3	0.09	77.9	6.46
1986	4	8.24	993.0	2.6	3.0	170.5	204.3	61.4	.059	.045	.051	0.37	.012	1.97	-	2.1	44.2	4.79	64.3	5.39

1033A.3

Table 3g: Lake Wabukayne: Mean annual concentrations for samples collected from below the sedimentation basin (1981-1986).

	#	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus		Nitrogen				Carbon			Fe	Na	K
									TP	FRP	NH_3	TKN	NO_2	NO_3	TC	TOC	TIC			
1981	10	7.96	884.5	14.32	20.02	124.4	136.7	91.7	.146	.101	.045	0.731	.085	2.00	-	4.6	29.2	2.67	69.7	7.91
1982	4	7.89	669.0	23.65	12.36	80.5	133.2	67.2	.114	.048	.076	1.080	.022	2.42	-	6.2	27.6	1.09	39.4	7.10
1983	9	7.70	583.0	25.00	25.00	55.0	115.4	75.4	.100	.040	.340	1.080	.160	1.00	-	6.0	29.6	1.30	30.0	5.70
1984	11	8.10	611.0	28.00	27.9	71.6	121.0	67.5	.120	.050	.190	1.300	.210	0.94	-	6.0	29.0	1.30	40.0	5.10
1985	4	8.16	732.0	30.75	15.37	107.3	126.9	68.5	.079	.012	.176	1.014	.056	0.92	-	5.6	30.4	1.06	51.5	4.88
1986	4	8.10	1016.5	18.50	16.30	181.6	143.9	82.3	.071	.013	.176	0.980	.061	1.10	-	5.1	33.4	0.77	88.7	5.38

1033A.4

Table 3h: Lake Wabukayne: Mean annual concentrations for samples collected from the outlet (1977-1986)

	#	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus		Nitrogen				Carbon			Fe	Na	K
									TP	FRP	NH_3	TKN	NO_2	NO_3	TC	TOC	TIC			
1977	23	7.98	444	33.4	[3]11.6	[3]36.4	91.0	[3]59.0	.070	.033	.077	0.770	.048	1.42	31.0	10.0	21.0	[3]1.94	[3]18.6	[3]6.0
1978	13	8.28	602	10.6	8.5	82.0	[1]115.0	[1]67.3	.044	.005	.057	0.77	.032	0.41	[2]38.0	[2]8.3	[2]29.7	[1]0.64	-	-
1979	15	8.11	598	15.7	10.9	74.0	125.7	57.0	.065	.009	.070	0.84	.041	0.55	35.1	6.7	28.4	1.58	34.6	5.71
1980	12	8.09	447	12.2	7.9	47.3	93.6	51.0	.071	.013	.135	0.80	.060	0.64	29.2	6.3	22.9	0.74	27.3	5.50
1981	15	7.94	639	53.6	31.5	80.4	104.4	72.8	.214	.065	.103	1.12	.092	1.57	-	5.1	24.0	2.30	36.8	7.24
1982	4	8.06	648	20.3	13.9	75.5	129.4	58.2	.102	.047	.092	1.01	.144	2.24	-	6.1	31.3	1.27	37.6	6.95
1983	9	7.70	503	25.0	26.7	49.0	108.2	66.9	.110	.030	.300	1.10	.150	0.65	-	5.4	27.0	1.30	29.0	5.50
1984	11	8.00	569	28.0	24.0	67.0	110.6	65.1	.110	.026	.170	1.17	.063	0.93	-	6.0	27.00	1.10	36.2	4.80
1985	4	8.23	733	23.7	22.1	111.8	125.3	68.7	.110	.006	.156	1.29	.061	0.88	-	5.8	30.1	0.80	53.6	4.79
1986	4	8.16	802	13.7	11.0	135.8	132.3	68.0	.062	.013	.158	0.87	.065	0.99	-	5.3	31.0	0.38	67.4	4.8

1. n = 3
2. n = 4
3. n = 9

1033A.5

Table 4a: Lake Aquitaine lake station samples collected as composites through the euphotic zone - 1977.

	pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				TC	TOC	TIC	Chlorophyll		Secchi disc
								Tot.	DR	NH_3	TKN	NO_2	NO_3				a	Acidified a	
1977																			
April 19	7.85	795	77	32	-	-	-	.168	.133	.634	1.260	.097	1.230	26	8	18	-	-	0.15
May 10	7.89	720	17	15	-	-	-	.077	.029	.106	.695	.062	1.220	26	4	22	-	-	0.6
17	8.77	730	6.4	12	135	-	-	.054	.002	.006	.880	.058	1.060	26	7	19	-	-	0.9
25	8.63	700	32	23	140	-	-	.036	.008	.080	.660	.056	1.540	22	4	18	-	-	0.2
31	7.11	700	10	48	125	-	-	.024	.006	.072	.640	.064	1.180	25	9	16	-	-	1.8
June 7	8.01	690	14	6.5	125	-	-	.032	.015	.082	.690	.052	1.350	26	7	19	-	-	0.7
14	8.09	700	4.5	4.6	130	-	-	.076	.002	.052	.590	.034	1.460	23	5	18	-	-	2.2
28	7.01	680	5.6	6.2	110	-	-	.016	.001	.030	.480	.017	1.330	24	7	17	-	-	1.6
July 5	8.15	690	5.0	4.4	58	-	-	.015	.005	.038	.500	.013	1.310	29	10	19	-	-	1.7
8	8.07	630	44	26	105	-	-	.053	.053	.070	.580	.032	1.910	25	6	19	-	-	0.28
12	8.02	640	10	3.8	108	-	-	.019	.007	.040	.450	.017	1.330	27	9	18	-	-	1.2
19	8.39	630	4.8	3.8	105	-	-	.014	.004	.030	.460	.016	1.280	25	7	18	-	-	1.4
26	8.02	640	6.4	4.0	105	-	-	.023	.005	.044	.800	.015	1.080	28	10	18	-	-	1.7
Aug. 3	7.83	630	13.0	4.9	100	-	-	.020	.008	.040	.520	.017	1.160	24	6	18	-	-	0.9
9	7.94	590	23	9.9	93	-	-	.042	.013	.036	.680	.018	.882	25	5	20	-	-	0.4
16	8.01	590	6.8	2.2	93	-	-	.027	.012	.034	.080	.011	.724	26	7	19	-	-	1.4
23	8.16	570	9.6	6.0	93	-	-	.019	.006	.032	.450	.015	1.230	24	5	19	-	-	0.9
31	8.24	570	3.6	2.3	90	-	-	.009	.002	.018	.420	.012	1.060	25	7	18	-	-	3.3
Sept. 8	8.03	570	3.2	0.8	83	-	-	.012	.002	.008	.420	.009	.441	25	6	19	-	-	3.5
19	8.05	550	6.0	3.9	76	-	-	.025	.005	.020	.380	.009	1.090	28	6	22	-	-	2.2
Oct. 4	7.95	395	37	13	58	-	-	.059	.058	.046	.960	.020	1.180	26	6	20	-	-	0.39
21	7.77	428	18	3.9	52	-	-	.064	.040	.020	.470	.013	1.170	28	7	21	-	-	0.9

Table 4b: Lake Aquitaine inlet above sedimentation basin samples - 1977

Date		pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				TC	TOC	TIC	Chlorophyll a	Chlorophyll Acidified a	Secc dis.
									Tot.	DR	NH_3	TKN	NO_2	NO_3						
1977																				
Apr.	19	8.75	940	4.4	5.7	-	-	-	.072	.020	.016	.730	.046	.864	29	9	20	-	-	-
May	3	7.77	580	57	-	65	-	-	.240	.150	.116	1.000	.055	2.490	34	12	22	-	-	-
	10	8.79	560	21	-	-	-	-	.170	.086	.052	1.100	.060	2.240	32	5	27	-	-	-
	17	9.30	530	5.6	28	67.5	-	-	.276	.003	.052	2.440	.072	.748	27	10	17	-	-	-
	25	8.00	520	230	145	53	-	-	.300	.046	.216	1.250	.072	2.580	27	7	20	-	-	-
	31	7.87	422	150	16	50	-	-	.190	.016	.032	1.340	.008	.122	34	20	14	-	-	-
June	7	7.86	405	220	180	48.5	-	-	.252	.110	.100	1.040	.085	.880	29	12	17	-	-	-
	14	7.90	430	12	4.0	48	-	-	.076	.042	.220	.810	.058	.812	24	8	16	-	-	-
	21	7.88	425	28	6.9	44.5	-	-	.082	.067	.324	.820	.055	.690	28	10	18	-	-	-
	28	7.85	395	33	11.0	39.5	-	-	.082	.042	.206	.820	.060	.960	23	7	16	-	-	-
July	5	8.05	385	13	4.6	37.5	-	-	.075	.039	.244	.870	.058	.917	28	10	18	-	-	-
	8	8.18	620	250	252	60	-	-	.342	.110	.088	1.140	.100	2.250	35	8	27	-	-	-
	12	7.86	375	68	11.0	33.5	-	-	.156	.075	.078	.900	.078	.137	27	12	15	-	-	-
	19	8.67	425	18	7.3	38.5	-	-	.105	.059	.052	.860	.093	1.300	26	9	17	-	-	-
	26	8.19	420	7.5	7.1	38.5	-	-	.066	.012	.134	.850	.070	.850	32	12	20	-	-	-
Aug.	3	7.70	320	90	35	27.5	-	-	.230	.160	.200	1.050	.100	1.300	24	9	15	-	-	-
	9	8.87	280	320	188	29	-	-	.465	.190	.114	1.300	.100	.730	26	9	17	-	-	-
	16	7.68	400	190	210	39	-	-	.400	.095	.094	1.850	.105	2.370	44	23	21	-	-	-
	23	7.79	315	180	41	26	-	-	.364	.190	.166	1.660	.080	1.050	33	14	19	-	-	-
	31	8.62	350	20	4.7	28.5	-	-	.146	.050	.092	.880	.077	.783	27	10	17	-	-	-
Sept.	8	7.79	335	34	8.9	25	-	-	.134	.084	.272	1.020	.098	.810	28	10	18	-	-	-
	19	7.83	340	63	28	25.5	-	-	.144	.100	.130	1.120	.080	.850	31	10	21	-	-	-
Oct.	4	8.01	510	69	45	48.5	-	-	.312	.180	.324	1.340	.175	1.580	40	8	32	-	-	-
	21	7.61	407	27	9.1	32	-	-	.222	.165	.294	1.330	.100	.930	34	6	28	-	-	-

Table 4c: Lake Aquitaine inlet below sedimentation basin samples - 1977

		pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				TC	TOC	TIC	Chlorophyll		Secchi disc
									Tot.	DR	NH_3	TKN	NO_2	NO_3				a	Acidified a	
1977																				
May	3	7.94	560	64	-	63	-	-	.224	.135	.094	.960	.057	2.510	34	14	20	-	-	-
	10	8.83	550	22	-	-	-	-	.160	.072	.012	.920	.062	2.360	32	7	25	-	-	-
	17	9.59	510	3.8	17	67.5	-	-	.126	.001	.014	1.600	.073	.747	22	10	12	-	-	-
	25	7.97	375	280	83	47	-	-	.660	.320	1.700	2.900	.100	1.450	34	14	20	-	-	-
	31	7.88	412	160	10	50	-	-	.180	.018	.026	1.160	.009	.121	34	21	13	-	-	-
June	7	7.82	385	120	31	43.5	-	-	.144	.088	.144	.880	.077	.833	29	13	16	-	-	-
	14	7.90	420	10	1.9	46.5	-	-	.076	.003	.196	.870	.056	.754	24	8	16	-	-	-
	21	7.82	405	30	5.1	42	-	-	.058	.048	.304	.860	.054	.660	27	9	18	-	-	-
	28	7.83	380	28	5.7	37	-	-	.064	.037	.220	.840	.058	.892	23	8	15	-	-	-
July	5	7.99	380	14	1.9	36	-	-	.053	.029	.228	.790	.056	1.430	27	10	17	-	-	-
	8	8.01	305	310	209	30.5	-	-	.480	.210	.160	1.360	.120	1.230	27	10	17	-	-	-
	12	7.88	360	84	32	22	-	-	.150	.074	.064	.840	.084	1.260	27	11	16	-	-	-
	19	8.70	400	13	4.5	36.5	-	-	.083	.038	.008	.810	.077	1.270	25	9	16	-	-	-
	26	8.16	425	7.5	5.2	38.5	-	-	.071	.027	.144	.790	.071	.879	35	16	19	-	-	-
Aug.	3	7.78	310	85	24	26	-	-	.205	.170	.160	1.200	.092	1.150	23	9	14	-	-	-
	9	8.09	255	340	285	25.5	-	-	.660	.240	.136	1.500	.110	.840	29	11	18	-	-	-
	16	7.96	295	90	210	39	-	-	.400	.095	.094	1.850	.105	2.370	44	23	21	-	-	-
	23	7.97	275	170	41	22	-	-	.252	.160	.164	1.020	.090	.850	23	8	15	-	-	-
	31	8.42	330	23	2.7	26	-	-	.114	.003	.032	.740	.072	.793	26	11	15	-	-	-
Sept.	8	7.75	315	38	4.9	22.5	-	-	.128	.066	.214	1.200	.075	.735	28	10	18	-	-	-
	19	8.09	540	6.0	3.5	80	-	-	.037	.008	.030	.570	.012	1.000	28	6	22	-	-	-
Oct.	4	7.91	385	52	29	50	-	-	-	.071	.040	-	.025	1.070	27	7	20	-	-	-
	21	7.86	424	18	2.7	50	-	-	.076	.051	.036	.500	.016	1.120	-	-	-	-	-	-

Table 4d: Lake Aquitaine outlet samples - 1977

	pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				TC	TOC	TIC	Chlorophyll		Secchi disc
								Tot.	DR	NH_3	TKN	NO_2	NO_3				a	Acidified a	
1977																			
Aug. 23	8.12	570	10	4.1	90	-	-	.018	.007	.430	.015	.015	1.580	22	3	19	-	-	-
Sept. 19	7.82	550	4.2	2.2	80	-	-	.010	.004	.020	.380	.009	1.060	27	6	21	-	-	-
Oct. 4	8.00	395	37	11	58	-	-	.106	.062	.048	.920	.022	1.070	26	6	20	-	-	-

Table 5a: Lake Aquitaine lake station samples collected as composites through the euphotic zone - 1978

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus Tot.	Phosphorus DR	Nitrogen NH_3	Nitrogen TKN	Nitrogen NO_2	Nitrogen NO_3	TC	TOC	TIC	Chlorophyll a	Chlorophyll Acidified a	Secchi disc
1978																			
May 11	8.90	820	3.5	4.9	193			.062	.001	.014	0.97	0.22	.620	21.6	5.6	16.0	16.6	10.8	0.9
18	8.27	790	5.7	7.9	178			.062	.027	.248	0.95	.024	.625				7.3	5.3	0.8
25	9.13	775	2.5	5.9	180			.084	.016	.246	1.05	.030	.41				15.6	12.0	0.9
June 1	9.19	720	2.8	6.2	188			.055	.001	.090	1.11	.032	.013				6.7	4.0	0.9
8	7.73	760	1.6	3.0	183	65	43.5	.055	.001	.088	.93	.018	.165	20.2	5.2	15.0	5.7	3.8	1.8
14	8.32	770	2.2	4.4	178			.046	.001	.016	.90	.012	.155				13.1	11.0	1.1
22	9.11	770	2.3	6.2	185			.030	.001	.004	.76	.001	<.005				8.8	8.5	0.9
29	8.72	780	2.7	3.3	178			.021	<.001	.046	.65	.002	.015				-	-	2.0
July 6	8.25	790	2.1	2.7	178	74	41.5	.022	.001	.096	.68	.003	.050	23.0	5.4	17.6	1.5	1.2	3.8
13	8.46	790	4.8	2.5	195			.025	.002	.012	.63	.004	.056				3.2	2.9	1.8
19	8.73	780	5.3	4.2	188			.026	.003	.012	.71	.002	<.005				4.2	3.3	1.9
27	8.55	780	2.7	3.3	190			.026	.001	.046	.71	.001	<.005				3.3	2.8	2.0
Aug. 3	8.24	795	1.9	2.8	180	82	45.0	.018	.001	.070	.61	.004	.026	25.8	6.2	19.6	1.4	1.9	2.3
11	8.12	800	2.3	1.2	170			.013	.001	.060	.55	.005	.050				1.0	0.8	4.7
17	8.13	800	2.3	1.6	-			.018	.003	.120	.61	.006	.079				2.3	1.1	3.5
24	8.24	800	2.0	1.8	180			.025	.005	.068	.60	.006	.095				2.8	-	3.7
31	7.95	800	2.2	2.4	178			.032	.006	.102	.59	.010	.135				2.1	1.4	3.8

Table 5b: Lake Aquitaine lake station samples collected from 1m above the bottom - 1978

Date		pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				TC	TOC	TIC	Fe	Na
									Tot.	DR	NH_3	TKN	NO_2	NO_3					
1978																			
May	11	8.97	820	3.4	3.6	190			.059	.001	.016	0.92	.022	.620	21.6	5.6	16.0		
	18	8.03	800	6.4	10.0	175			.043	.015	.190	0.79	.037	.635					
	25	8.02	785	3.8	3.8	178			.044	.010	.150	0.68	.023	.625					
June	1	8.10	790	1.9	4.3	188													
	8	7.71	800	2.1	5.4	178	91	41.0	.042	.008	.228	0.95	.022	.518					
	14	8.07	780	2.9	7.6	175			.091	.002	.160	1.20	.017	.290	25.8	4.6	21.2	.05	
	22	8.54	780	2.6	6.3	178			.077	.001	.074	1.15	.010	.130					
	29	8.72	780	3.4	6.0	178			.059	.001	.042	1.02	.007	.045					
									.037	.001	.026	.76	.002	.005					
July	6		780		2.3		75	40.5											
	13	8.50	790	5.2	2.1	190			.018	.002	.010	.59	.004	.046	23.6	5.4	18.2	.10	
	19	8.20	780	9.1	4.7	180			.049	.007	.206	1.05	.008	.017					
	27	8.32	790	3.3	2.5	183			.027	.001	.092	.76	.002	<.005					
Aug.	3	8.24	795	2.0	2.8	180	82	45.0	.020	.001	.070	.57	.003	.027	25.8	6.2	19.6	.10	
	11	8.07	800	2.0	1.5	178			.020	.002	.070	.60	.005	.060					
	17	8.04	800	2.6	1.7	-			.016	.002	.114	.60	.006	.074					
	24	8.25	800	1.9	1.6	178			.016	.003	.072	.57	.006	.090					
	31	8.00	800	2.4	2.7	178			.024	.004	.106	.65	.001	.140					

Table 5c: Lake Aquitaine inlet above sedimentation basin samples - 1978

Date		pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				TC	TOC	TIC	Fe	Na	K
									Tot.	DR	NH_3	TKN	NO_2	NO_3						
1978																				
May	11	8.01	580	31.0	31.0	93			0.135	.011	.232	1.34	.044	.605	29.7	7.8	21.0			
	18	7.97	600	20.0	24.0	79			.156	.096	.350	1.32	.315	1.01						
	25	8.98	560	3.6	5.1	95			.116	.051	.356	1.25	.015	.320						
June	1	9.10	560	2.8	7.6	98														
	8	8.15	560	5.3	8.6	87	94	54	.129	.008	.224	1.66	.013	.117						
	14	7.68	540	12.0	10.0	79			.142	<.001	.228	1.88	.026	.165	32.1	10.9	.21			
	22	7.72	550	2.5	1.5	80			.088	.004	.396	1.70	.038	.295						
	29	8.60	570	4.5	3.3	83			.105	.056	.830	1.69	.056	.345						
									.078	.006	.292	1.76	.078	.420						
July	6	7.76	560	3.1	4.4	75	103	48	.128	.082	.690	1.94	.068	.675	41.0	15.8	25.2			
	13	7.78	580	5.5	1.9	85			.202	.125	.680	2.20	.078	.522						
	19	7.73	580	4.9	1.7	85			.235	.155	1.30	2.45	.087	.488						
	27	7.59	520	5.0	3.1	73			.225	.140	.850	2.05	.140	.640						
Aug.	3	7.30	540	14.0	19.0	66	100	77	.290	.125	.510	1.62	.089	1.11	38.6	12.6	26.0	.62		
	11	7.78	445	5.3	2.1	58			.240	.177	.660	1.46	.100	1.03						
	17	7.64	415	3.2	1.4	54			.205	-	-	1.55	-	-						
	24	7.56	320	36	42	33.5			.230	.125	.352	1.50	.105	.970						
	31	7.55	335	16	8.2	35.5			.158	.135	.780	1.48	.120	.680						
Oct.	25	8.49	380	6.0	18	36.5	92	48.5	.204	.003	.028	1.88	.068	.605	29.6	9.2	20.4	.25		

Table 5d: Lake Aquitaine inlet below sedimentation basin samples - 1978

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				TC	TOC	TIC	Fe	Na	K
								Tot.	DR	NH_3	TKN	NO_2	NO_3						
1978																			
May 11	8.76	750	8.5	14.0	168			0.076	.001	.028	0.91	.027	.605	23.4	8.7	17.2			
18	8.02	560	15.0	18.0	82			0.178	.084	.700	1.70	.039	.690						
25	8.92	770	3.5	9.2	183			.080	.012	.388	1.06	.033	.360						
June 1	9.21	556	3.1	9.6	98														
8	8.17	550	4.4	11.0	86	93	54	.095	.006	.222	1.50	.012	.098						
14	7.64	520	10.0	7.5	78			.096	.001	.286	1.52	.025	.140	32.0	11.0	21.0	0.18		
22	7.65	560	3.0	2.5	78			.078	.005	.406	1.28	.037	.230						
29	8.66	560	4.7	4.2	83			.118	.062	.840	2.20	.063	.555						
								.054	.005	.278	1.68	.069	.405						
July 6	7.49	550	4.6	23	75	101	45	.260	.140	1.06	3.30	.064	.510	41.2	16.0	25.2	-		
13	7.80	570	5.2	2.4	83			.218	.100	.680	2.44	.072	.463						
19	7.75	580	5.0	5.2	88			.225	.160	1.03	2.55	.080	.485						
27	7.51	485	6.0	3.0	68			.195	.135	.900	2.10	.140	.525						
Aug. 3	7.38	395	10	8.0	51	82	39	.202	.160	1.00	1.70	.090	.725	34.8	13.6	21.2	.74		
11	7.74	390	5.2	1.9	49.5			.178	.149	.760	1.48	.089	.745						
17	7.50	415	3.6	1.2	54			.220	-	-	1.60	-	-						
24	7.77	400	8.4	6.8	49.5			.220	.175	.840	1.80	.105	.645						
31	7.55	335	16	8.2	35.5			.158	.135	.780	1.48	.120	.680						
Oct. 25	8.56	370	6.3	11	34.5	88	47.0	.128	.003	.030	1.24	.066	.650	29.9	9.1	19.8	.28		

Table 5e: Lake Aquitaine outlet samples - 1978

Date		pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				TC	TOC	TIC	Fe	Na	K
									Tot.	DR	NH_3	TKN	NO_2	NO_3						
1978																				
May	11	8.97	820	4.0	7.1	190			.054	.001	.026	1.00	.022	.625	21.8	6.2	16.0			
	18	8.31	790	5.1	7.4	175			.057	.020	.256	.98	.022	.635						
	25	9.17	775	2.4	4.5	175			.054	.018	.232	.66	.029	.400						
June	1	NO OUTFLOW																		
	8	NO OUTFLOW																		
	14	8.39	770	2.1	4.5	175			.043	.002	.016	.80	.011	.155						
	22	NO OUTFLOW																		
	29	NO OUTFLOW																		
July	6	NO OUTFLOW																		
	13	NO OUTFLOW																		
	19	NO OUTFLOW																		
	27	NO OUTFLOW																		
Aug.	2	8.26	795	1.8	2.2	180	82	44.5	.020	.003	.064	.55	.005	.035	25.8	6.2	19.6	.09		
	11	8.16	800	2.1	1.0	183			.019	.001	.070	.61	.005	.055						
	17	8.09	800	1.9	1.0	-			.012	.001	-	-	.006	.084						
	24	8.29	800	1.8	0.8	178			.015	.004	.064	.56	.006	.095						
	31	8.05	800	1.8	1.7	178			.016	.002	.082	.60	.009	.130						

Table 6a: Lake Aquitaine lake station samples collected as composites through the euphotic zone - 1979.

		pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				TC	TOC	TIC	Chlorophyll		Secchi disc
									Tot.	DR	NH_3	TKN	NO_2	NO_3				a	Acidified a	
1979																				
May	15	7.80	1160	1.6	3	285			.040	.001	.042	.75	.027	.948						
	22	7.88	1130	-	3	270			.032	.001	.034	.69	.024	.816				8.2	L.A.	2.3
	31	8.41	1070	1.5	1	255			.024	<.001	.054	.65	.022	.748				L.A.	L.A.	3.5
																		1.1	0.6	4.8
June	7	8.43	1070	0.85	0.1	240														
	14	8.24	1000	2.2	0.2	220	83	44.0	.020	<.001	.052	.58	.018	.690						
	21	8.59	1000	1.2	0.4	220	81	43.0	.025	.002	.031	.73	.018	.622	23.6	4.4	19.2	1.4	1.2	4.9
	28	8.81	1010	1.2	2.0	235			.024	.001	.021	.64	.014	.551	27.4	4.4	19.0	2.2	1.7	4.75
									.020	.001	.008	.60	.012	.398				2.0	1.2	4.9
																		3.8	1.9	4.45
July	5	8.64	990	2.0	2.0	235														
	10	8.83	1000	1.9	2.0	245			.029	.002	.028	.67	.011	.349						
	13	8.90	980	1.7	1.0	225			.024	.001	.008	.60	.011	.297				1.0	-	4.9
	26	8.81	980	2.2	3	235	75	44.0	.012	.001	.008	.57	.010	.200				3.5	3.1	4.0
	31	8.88	990	2.2	3	235	72	43.5	.017	.027	.015	.55	.008	.052	20.6	5.4	15.2	3.9	3.3	4.0
									.017	.003	.010	.64	.003	.017				7.4	6.8	2.5
																		-	-	2.5
Aug.	8	8.18	960	1.6	1	225	-	-	.013	.001	.052	.53	.003	.027						
	16	8.18	970	2.5	3	225	80	41.0	.015	<.001	.062	.53	.003	.027	22.8	4.8	18.0	2.5	2.1	4.4
																		1.4	1.1	3.1
Sept.	20	8.49	920	3.6	5	200	86	41.5	.026	.004	.006	.55	.001	.005	23.1	4.7	18.4	5.8	2.1	1.3

Table 6b: Lake Aquitaine lake stations samples collected from 1m above the bottom - 1979.

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				TC	TOC	TIC	Fe	Na	K
								Tot.	DR	NH_3	TKN	NO_2	NO_3						
1979																			
May 15																			
22																			
31																			
June 7																			
14																			
21																			
28																			
July 5																			
10																			
19	8.89	980	1.5	1	230			.017	.001	.012	.58	.010	.170						
26	8.46	1000	2.0	3	233	81	45.5	.019	.006	.105	.61	.008	.087	23.2	5.6	17.6	.04	140	4.40
31	8.64	990	1.8	2	238	72	43.0	.020	.002	.016	.61	.003	.022				.02	150	4.30
Aug. 8	8.27	970	1.2	0.7	225	-	-	.018	.001	.041	.55	.003	.032					155	4.55
16	8.04	970	3.0	3	230	80	41.0	.016	.001	.054	.54	.003	.022	22.5	4.7	17.8	.17	137	4.45
Sept. 20	8.63	920	3.2	5	203	85	41.5	.025	.002	.006	.57	.001	<.005	22.9	4.5	18.4	.15	138	4.25
																		131	

Table 6c: Lake Aquitaine inlet above sedimentation basin samples - 1979

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus Tot.	Phosphorus DR	Nitrogen NH_3	Nitrogen TKN	Nitrogen NO_2	Nitrogen NO_3	TC	TOC	TIC	Fe	Na	K
1979																			
May 15	7.12	600	300	38	78			.335	.210	.226	1.83	.064	1.34						
22	8.96	550	9.0	22	98			.085	.001	.006	1.50	.063	1.32						
31	8.75	495	40.0	23	71			.115	.008	.057	1.15	.066	.514						
June 7	8.50	530	3.2	5.0	88			.053	<.001	.069	.96	.058	.177						
14	8.54	485	16.0	8.0	64	91	40.5	.093	.006	.076	1.15	.088	1.46	29.0	8.0	21.0	.68	37	5.00
21	9.02	580	2.4	3.0	91	84	54.0	.088	.015	.139	1.11	.140	.860	35.4	17.2	19.2	.05	52	-
28	7.84	540	4.6	8.0	85			.090	.002	.015	1.43	.077	.738						
July 5	7.63	520	3.6	5.0	83			.083	.004	.144	1.30	.085	.800						
10	8.45	520	3.2	8.0	80.5			.094	.006	.067	1.75	.086	.449						
19	9.49	410	2.0	6.0	64			.065	.002	.026	.85	.076	.109					49	4.90
26	8.71	410	5.2	7	63	58	44.5	.095	.004	.035	1.25	.019	.116	22.2	12.4	9.8		36	4.55
31	7.86	455	3.2	2	69	67	48.0	.030	.013	.188	.49	.035	.155					37	4.85
Aug. 8	7.68	405	11	5	52			.123	.059	.440	1.45	.077	.633					40	5.10
16	8.27	960	2.6	5	-	79	41.0	.017	.005	.054	.56	.004	.031	22.9	4.7	18.2	.13	30	4.85
Sept.20	8.46	315	11	8	35	72	28.5	.180	.117	.182	.95	.237	.488	21.9	6.3	15.6	.66	137	4.15
																		22	-

Table 6d: Lake Aquitaine inlet below sedimentation basin samples - 1979.

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				TC	TOC	TIC	Fe	Na	K
								Tot.	DR	NH_3	TKN	NO_2	NO_3						
1979																			
May 15	7.51	900	16.0	19	190			.093	.004	.161	1.20	.043	1.01						
22	8.02	550	16.0	32	95			.270	.001	.017	2.70	.061	.129						
31	8.83	460	30.0	24	68			.093	.003	.016	1.08	.051	.454						
June 7	8.91	520	4.0	6	85			.065	.001	.096	1.05	.057	.158						
14	8.19	460	16.0	10	62	89	39	.110	.007	.110	1.30	.087	1.46	28.4	7.8	20.6	.73	37	5.05
21	9.18	470	2.3	6	77	65	43.0	.059	.002	.030	1.28	.094	.731	23.5	4.5	19.0	.04	43	
28	8.33	530	5.0	9	83			.073	.002	.008	1.38	.076	.729						
July 5	7.72	500	4.5	6	78			.070	.002	.088	1.33	.076	.734						
10	8.49	520	2.6	6	82.5			.074	.003	.037	1.33	.110	.550						
13	9.37	385	2.9	7	61			.052	.001	.012	.83	.068	.022					49	4.90
19																		35	4.35
26	8.78	405	6.8	6	62	59	44.5	.085	.005	.013	1.13	.017	.103	21.6	12.0	9.6			
31	7.86	460	2.6	1	68	67	46.5	.093	.025	.208	1.38	.035	.155					37	4.70
																		39	5.20
Aug. 8	7.45	390	11	3	49.5			.098	.049	.550	1.45	.068	.547						
16	7.41	475	3.6	5	61	99	37.0	.153	.093	1.47	2.50	.087	.543	33.8	9.2	24.6	.38	28	4.75
																		38	4.55
Sept.20	8.38	315	11	7	35.0	72	28	.170	.107	.242	.93	.207	.451	22.0	6.2	15.8	.69	23	-

Table 6e: Lake Aquitaine outlet samples - 1979

Date		pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				TC	TOC	TIC	Fe	Na	K
									Tot.	DR	NH_3	TKN	NO_2	NO_3						
1979																				
May	15	7.92	1160	1.0	2.0	280			.037	.002	.052	.72	.027	.948						
	22	8.42	1100	1.0	0.7	260			.024	<.001	.015	.61	.023	.852						
	31	8.43	1070	0.8	0.2	250			.020	<.001	.040	.62	.021	.764						
June	7	7.95	1060	0.85	0.1	250			.024	<.001	.032	.61	.071	.703						
	14	8.31	1000	2.0	0.5	230	83	44.0	.019	.001	.041	.77	.018	.612	23.6	4.4	19.2	.04	125	4.20
	21	8.62	1010	1.4	0.6	229	81	42.5	.018	.001	.020	.63	.014	.551	23.5	4.5	19.0	.02	145	-
	28*																			
July	5*																			
	10	8.48	1000	1.2	1.0	245			.018	.001	.010	.61	.011	.274					150	4.30
	19*																			
	26	8.92	980	3.0	3.0	225	72	42.5	.020	.026	.013	.59	.008	.042	19.6	5.6	14.0		145	4.30
	31	8.58	980	1.8	2	238	70	44.5	.020	.003	.014	.62	.002	.008				.03	160	4.40
Aug.	8	8.32	970	1.5	1	228	-	-	.020	.002	.046	.68	.004	.036					155	4.50
	16	8.21	970	2.6	2	223	80	41.0	.015	.004	.056	.53	.004	.031	23.2	4.6	18.6	.11	145	5.35
Sept.	20	8.61	920	3.2	5	198	85	41.0	.026	.002	.018	.60	.001	<.005	23.0	4.8	18.2	.14	130	-

Table 7a: Lake Aquitaine lake station samples collected as composites through the euphotic zone - 1980.

		pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				TC	TOC	TIC	Chlorophyll		Secchi disc
									Tot.	FRP	NH_3	TKN	NO_2	NO_3				a	Acidified a	
1980																				
May	29	8.96	1000	-	4	243	61	48.0	.035	.002	.116	.80	.003	.022	17.6	5.6	12.0	14	-	1.1
June	5	8.94	1000	-	-	-	-	-	.071	.004	.058	1.04	.003	.007	21.4	5.4	16.0	13.8	-	1.8
	12	8.17	1050	4.3	5	243	78	-	.049	.005	.116	.82	.006	.054	23.5	5.5	18.0	-	-	1.6
	26	8.66	1050	3.7	4	265	81	45.0	.031	.001	.056	.70	.006	.054	25.5	5.9	19.0	8.8	-	2.0
July	4	8.41	1050	4.9	5	243	81	46.5	.035	.004	.116	.75	.011	.064	24.1	5.3	18.8	6.9	-	1.7
	10	8.51	1050	7.3	8	229	82	45	.030	.002	.088	.75	.004	.006	25.6	6.0	19.6	8.4	-	1.05
	24	8.84	1000	5.2	6	224	77	43.5	.034	.006	.050	.61	.007	.013	22.1	5.1	17.0	4.1	-	1.3
Aug.	7	9.11	800	13	13	210	60	42.0	.060	.007	.002	.66	.007	.003	19.4	6.8	12.6	10.2	-	0.6
	14	9.03	800	14	14	205	64	42.0	.065	.011	.012	.70	.006	.004	21.1	7.5	13.6	12.7	-	0.6
Sept.	30	7.94	840	5.7	8	182	90	39.0	.065	.004	.156	.90	.012	.123	27.5	5.7	21.8	10.2	-	0.8
Oct.	22	8.11	800	7.5	10	162	92	39.0	.040	.011	.118	.73	.013	.237	28.1	5.9	22.2	6.7	-	0.9
Nov.	5	8.08	780	5.0	6	168	94	40.0	.035	.006	.124	.65	.010	.230	28.6	5.4	23.2	16.0	-	1.15
	25	8.39	780	2.5	3	158	97	44.5	.041	.002	.028	.72	.006	.146	28.9	5.5	23.4	22.0	-	1.6

Table 7b: Lake Aquitaine lake station samples collected from 1m above the bottom - 1980

1980		pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				Carbon			Fe	Na	K
									Tot.	FRP	NH_3	TKN	NO_2	NO_3	TC	TOC	TIC			
May	25	7.77	1100	-	6	248	99	46.5	.048	.001	.206	1.05	.011	.049	30.0	5.2	24.8	.08	160	-
June	5	8.22	1050	-	-	-	86	-	.066	.002	.010	1.02	.008	.002	26.8	5.4	21.4	.16	-	-
	12	8.08	1050	4.3	4	239	78	45.5	.053	.002	.120	.84	.005	.050	24.5	5.5	19.0	.24	145	4.65
	26	7.78	1050	4.6	4	265	90	43	.073	.002	.306	1.23	.006	.054	29.0	6.0	23.0	.25	136	4.55
July	4	7.75	1050	5.0	6	274	90	44	.044	.002	.314	1.00	.004	.021	28.0	5.4	22.6	-	150	-
	10	7.56	1050	7.4	11	251	93	43.5	.040	.001	.280	.92	.002	.008	30.1	6.1	24.0	.46	151	4.65
	24	7.64	1050	6.0	9	235	99	37.5	.053	.002	.55	1.23	.003	.007	30.1	5.1	25.0	.50	148	4.70
Aug.	7	7.45	1050	5.4	8	235	112	33.0	.072	.004	.883	1.62	.004	.001	34.7	5.5	29.2	.48	142	5.9
	14	7.63	1000	28	14	256	117	29.5	.050	.027	.94	1.60	.004	<.005	37.0	6.2	30.8	.54	140	4.5
Sept.	30	7.95	820	6.4	6	178	91	39.0	.050	.001	.184	.87	.009	.121	27.3	5.7	21.6	.58	110	4.65
Oct.	22	8.06	800	8.0	7	161	92	39.0	.039	.003	.118	.69	.014	.236	28.2	5.8	22.4	.54	95	4.35
Nov.	5	8.08	780	5.1	6	165	93	40.0	.036	.005	.120	.67	.010	.230	28.4	5.4	23.0	.32	93	4.15
	25	8.40	780	2.3	3	156	96	45.0	.041	.002	.034	.70	.006	.144	28.8	5.6	23.2	.13	94	4.20

Table 7c: Lake Aquitaine samples from the inflow above the sedimentation basin - 1980

		pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				Carbon			Fe	Na	K
									TP	FRP	NH_3	TKN	NO_2	NO_3	TC	TOC	TIC			
1980																				
May	29	9.03	750	4.4	10	162	73	62	.052	.009	.130	.85	.042	.353	21.6	6.6	15.0	.44	93	-
June	5	7.86	650	—	—	—	73	—	.102	.007	.180	1.24	.045	.683	24.8	7.0	17.8	.68	—	—
	12	8.12	650	7.8	10	88.2	116	72	.068	.001	.148	.95	.064	.846	34.8	6.4	28.4	.54	54	6.0
	26	8.47	950	2.8	3	233	92	45	.049	<.001	.068	.86	.068	.807	30.2	7.2	23.0	.09	110	3.85
July	4	8.79	1050	3.8	3	139	77	39	.055	.115	.188	.78	.060	.670	23.0	5.2	17.8	—	83	—
	10	8.90	600	2.8	5	131	95	37.5	.038	.012	.158	.72	.048	.321	23.2	7.8	15.4	.10	65	3.45
	24	8.35	415	7.8	11	62.0	71	35	.068	.002	.058	.83	.075	.497	23.7	7.5	16.2	.62	37	4.05
Aug.	7	9.32	455	5.3	12	51	100	54.5	.365	.012	.022	2.33	.082	.453	31.5	9.3	22.2	.78	28	5.9
	14	8.69	375	30.	43	43.5	79	41.0	.215	.053	.002	1.30	.087	.593	27.4	9.4	18.0	2.10	26	4.3
Sept.	30	7.66	455	7.8	15	75.0	75	36.5	.182	.076	.292	2.26	.090	.665	22.9	4.9	18.0	.68	42	3.65
Oct.	22	7.74	490	3.2	8	59.5	106	5.15	.280	.200	.51	1.48	.094	.746	30.7	5.1	25.6	.22	32	3.40
Nov.	5	7.68	540	3.7	5	61.0	114	59.5	.355	E	.90	1.83	E	E	34.8	5.8	29.0	.26	31	4.65
	25	7.88	640	8.3	11	94	113	53.0	.200	.140	.246	1.10	.061	1.14	33.0	4.8	28.2	.53	57	3.90

Table 7d: Lake Aquitaine samples from the inflow below the sedimentation basin - 1980

		pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				Carbon			Fe	Na	K
									TP	FRP	NH_3	TKN	NO_2	NO_3	TC	TOC	TIC			
1980																				
May	29	8.84	750	4.5	13	148	73	61.0	.070	.017	.272	1.15	.044	.326	22.4	6.8	15.6	.47	96	-
June	5	7.92	650	-	-	-	72	-	.070	.007	.168	1.00	.045	.683	24.2	6.8	17.6	.56	-	-
	12	7.97	1050	1.8	5	258	91	45.5	.060	.001	.560	1.47	.050	.560	28.9	6.7	22.2	.22	150	4.10
	26	8.51	950	1.5	2	229	92	44.5	.037	<.001	.056	.83	.064	.806	30.2	7.2	23.0	.07	119	3.8
July	4	9.13	650	2.7	4	137	75	38.5	.032	.002	.086	.62	.059	.646	22.6	6.8	15.8	-	82	-
	10	8.92	600	3.0	5	119	95	37.0	.030	.006	.116	.62	.049	.331	22.9	7.7	15.2	.12	67	3.50
	24	8.30	410	7.5	10	61	70	34.5	.060	.002	.032	.70	.076	.487	23.4	7.4	16.0	.56	37	3.90
Aug.	7	9.61	430	5.6	20	47	97	53.0	.505	.018	.067	3.15	.069	.161	31.8	10.0	21.8	1.11	26	5.4
	14	8.15	400	30.	42	44	84	46.0	.185	.048	.004	1.40	.076	1.02	29.8	9.8	20.0	2.0	27	3.95
Sept.	30	8.27	320	9.4	17	39	68	26.5	.072	.009	.156	.81	.054	.481	20.8	5.2	15.6	.80	24	3.05
Oct.	22	7.73	330	3.8	9	35	78	31.0	.152	.039	.364	1.28	.044	.276	24.3	5.7	18.6	.30	22	2.85
Nov.	5	7.51	380	4.0	10	37	86	44.0	.292	E	.54	1.48	.041	.200	28.3	5.9	22.4	.38	23	4.55
	25	8.23	570	11.	14	83	92	46.5	.202	.068	.014	1.10	.050	-	28.1	5.9	22.2	.68	57	4.20

Table 7e: Lake Aquitaine outflow samples - 1980

1980		pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus Tot.	Phosphorus FRP	Nitrogen NH_3	Nitrogen TKN	Nitrogen NO_2	Nitrogen NO_3	Carbon TC	Carbon TOC	Carbon TIC	Fe	Na	K
May	29	8.96	1000	-	4	244	61	49	.035	.001	.138	.85	.002	.008	17.7	5.5	12.2	.09	160	-
June	5	9.05	1000	-	-	-	68	-	.031	.002	.024	.62	.003	.007	20.4	5.4	15.0	.13	-	-
	12	8.26	1050	-	4	242	77	45.5	.039	.002	.102	.75	.005	.040	23.8	5.6	18.2	.23	150	4.65
	26	8.82	1050	3.7	4	270	80	45	.034	.001	.022	.66	.006	.054	25.6	6.0	19.6	.16	133	4.45
July	4	8.79	1050	3.8	3	279	78	46.5	.024	.002	.042	.60	.007	.023	23.0	5.2	17.8	-	152	-
	10	8.85	1050	6.5	6	243	81	46.5	.022	.002	.036	.62	.004	.006	24.4	6.0	18.4	.32	144	4.55
	24	8.90	1000	4.5	5	228	76	44.0	.029	.002	.018	.59	.003	.007	31.2	5.0	16.2	.26	137	4.40
Aug.	7	9.09	800	13	12	232	61	42.0	.062	.006	.004	.65	.005	<.005	19.3	6.7	12.6	.47	114	4.6
	14	9.04	800	13	13	213	64	42.0	.075	.014	.008	.70	.004	.001	21.0	7.4	13.6	.56	115	4.3
Sept.	30	8.00	840	6.5	7	188	90	39.0	.042	.001	.152	.81	.010	.125	27.1	5.7	21.4	.48	110	4.65
Oct.	22	8.10	800	8.0	8	170	92	39.0	.036	.003	.122	.71	.013	.232	28.0	5.8	22.2	.52	97	4.35
Nov.	5	8.05	780	5.5	5	168	94	40.0	.032	.006	.142	.75	.010	.230	28.6	5.4	23.2	.34	96	4.15
	25	8.36	780	2.4	3	152	97	45.0	.031	.001	.030	.67	.007	.143	29.3	5.7	23.6	.13	97	4.15

Table 8a: Lake Aquitaine lake station samples collected as composites through the euphotic zone - 1981.

1981	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus Tot	Phosphorus SRP	Nitrogen NH_3	Nitrogen TKN	Nitrogen NO_2	Nitrogen NO_3	TC	TOC	TIC	Chlorophyll a	Chlorophyll Acidified a	Secchi disc
April 13	8.02	1250	28.0	30	311	103	49.5	.072	.025	.264	1.01	.019	.47	-	3.9	24.8	-	-	1.2
May 7	7.88	1260	25.0	9	310	100	48.0	.109	.025	.218	1.11	.015	.225	-	4.6	26.0	15.0	9.5	0.4
May 20	7.93	1280	11.0	8	310	99	49.0	.075	.034	.274	0.82	.018	.245	-	4.2	24.8	5.6	2.0	0.6
June 18	8.43	1230	5.2	5	305	86	51.0	.065	.009	.113	0.73	.017	<.005	-	4.9	22.2	6.6	2.9	0.9
July 6	8.45	1160	5.0	12	280	85	49.0	.058	.014	.174	0.84	.003	-	-	4.1	19.0	20.0	18.0	1.0
July 15	8.38	1180	10.5	5	300	82	45.0	.055	.010	.128	0.70	.001	<.005	-	4.8	18.4	5.9	4.6	0.9
July 23	7.99	1180	12.4	6	282	81	52.0	.035	.012	.112	0.58	.001	<.005	-	4.4	19.8	2.6	1.6	-
July 31	7.86	1120	4.9	-	-	86	47.5	.055	.012	.010	0.65	.165	<.005	-	3.8	19.0	1.6	0.8	0.8
Aug. 4	7.45	* pH results from sampled rainwater						-	-	-	-	-	-	-	-	-	-	-	-
Aug. 7	7.31	1160	15.7	13	245	82	46.5	.082	.012	.026	0.72	.165	0	-	4.5	18.8	4.1	2.3	0.3
Aug. 13	8.10	920	7.6	11	223	79	39.0	.050	.017	.090	0.62	.046	.205	-	4.3	18.6	4.9	4.2	0.7
Aug. 20	7.03	880	0.9	-	207	87	44.0	.075	.025	.006	0.75	.150	.215	-	4.2	19.4	5.7	3.9	0.9
Oct. 9	7.98	730	12.6	-	151	100	44.0	.070	.022	.004	0.88	.008	.765	-	4.5	22.6	8.0	6.8	0.6
Nov. 2	7.88	640	17.9	11	117	100	48.0	.098	.040	.196	0.75	.051	.405	-	4.7	24.0	22.3	20.1	0.5

1022A.6

Table 8b: Lake Aquitaine lake station samples collected from 1m above the bottom - 1981.

	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus		Nitrogen				TC	TOC	TIC	Fe	Na	K
								Tot	SRP	NH_3	TKN	NO_2	NO_3						
1981																			
April 13	8.02	1250	6.0	3	306	97	50.0	.055	.028	.208	0.84	.017	.445	-	4.1	23.8	0.31	173	4.85
May 7	7.83	1400	18.0	13	312	100	49.0	.095	.024	.400	0.92	.024	.485	-	4.5	26.6	0.92	187	5.00
May 20	7.84	1280	20.0	17	305	100	49.5	.072	.023	.042	0.78	-	-	-	3.8	25.2	1.24	194	5.10
June 18	7.51	1270	6.0	12	311	111	46.0	.068	.006	.002	1.12	.004	.610	-	4.8	30.6	0.94	190	4.75
July 6	8.61	1260	5.5	19	-	127	35.0	.065	.007	.810	1.41	.038	.015	-	4.1	31.8	1.10	165	4.75
July 15	7.49	1260	13.3	13	300	121	39.0	.070	.006	.680	1.38	.066	.015	-	4.4	29.8	0.80	177	4.85
July 23	7.55	1230	1.4	12	298	114	39.0	.055	.004	.480	1.35	-	-	-	4.3	28.8	0.57	174	4.80
July 31	7.52	1140	4.9	-	-	94	43.0	.062	.019	.006	0.90	-	-	-	3.8	22.0	0.54	161	4.75
Aug. 7	7.54	1340	14.5	22	289	103	42.0	.078	.006	.010	1.15	.032	.570	-	4.4	26.4	1.10	162	4.95
Aug. 13	7.49	1120	7.9	12	268	103	34.0	.078	.005	.026	1.42	.002	.808	-	4.3	27.2	0.66	159	5.00
Aug. 20	7.41	1040	2.8	14	237	97	38.5	.132	.022	.008	1.50	.001	.830	-	4.0	24.6	0.62	142	5.00
Oct. 9	7.94	720	14.6	-	159	100	-0	.060	.019	.004	0.52	.001	.805	-	4.4	26.0	0.88	89	-
Nov. 2	7.95	620	21.0	8	115	99	46.0	.088	.037	.146	0.70	.081	.400	-	4.8	24.4	1.20	68	5.10

1022A.7

Table 8c: Lake Aquitaine samples taken from the inlet above the sedimentation basin - 1981.

	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus		Nitrogen				TC	TOC	TIC	Fe	Na	K
								Tot	SRP	NH_3	TKN	NO_2	NO_3						
1981																			
April 13	8.34	2350	2.5	11	638	134	89	.206	.18	0.05	1.42	.004	2.30	-	3.2	31.2	0.19	337	5.15
May 7	7.42	1430	10.0	10	342	112	62	.333	.24	1.250	2.28	.088	0.35	-	7.2	31.4	0.14	200	4.45
May 20	7.46	1000	10.0	7	230	96	54	.410	.37	1.67	2.80	.003	0.01	-	6.7	30.6	0.37	132	4.20
June 18	8.34	660	1.5	1	144	63	51	.070	.03	0.29	0.90	.098	0.35	-	8.2	25.2	0.54	82	4.55
July 6	8.02	1240	7.5	15	66	232	29	.092	.05	0.01	1.01	.000	0.00	-	5.6	16.6	0.70	37	4.00
July 15	9.27	460	3.6	4	85	70	39	.060	.03	0.24	0.72	.056	0.30	-	6.1	14.4	0.17	46	8.00
July 23	7.55	500	12.9	36	82	89	44	.335	-	0.05	3.48	.029	0.01	-	13.3	14.8	1.20	47	6.60
July 31	7.55	430	57.0	-	-	83	42	.280	.08	0.02	0.80	.040	1.46	-	4.3	22.0	0.00	31	7.20
Aug. 4	8.25	142	270.0	275	-	-	20	-	.05	0.02	3.90	.020	1.48	-	4.4	18.6	-	4	3.25
Aug. 7	7.94	460	206.0	217	41	111	58	.684	.33	0.02	1.48	.071	1.83	-	7.3	12.6	-	25	-
Aug. 13	7.49	390	47.0	47	40	82	40	.290	.20	0.01	2.12	.018	2.13	-	5.9	24.4	4.60	24	8.00
Aug. 20	7.46	540	12.3	22	62	-	59	.340	.27	0.01	1.82	.004	2.30	-	6.4	22.4	1.60	-	-
Oct. 9	7.98	600	177.0	-	63	170	85	.710	.37	0.02	1.15	.030	1.02	-	6.5	27.6	14.25	-	-
Nov. 2	7.41	600	14.5	17	55	138	90	.160	.09	0.06	0.80	.019	1.03	-	5.4	32.6	1.35	28	6.60

1022A.8

Table 8d: Lake Aquitaine samples from the inlet below the sedimentation basin - 1981.

	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus		Nitrogen				TC	TOC	TIC	Fe	Na	K
								Tot	SRP	NH_3	TKN	NO_2	NO_3						
1981																			
April 13	7.68	2800	2.3	6	766	130	83	.192	.16	0.268	1.66	-	-	-	3.5	32.2	.10	434	5.3
May 7	7.35	1420	7.0	12	342	110	62	.333	.18	0.710	2.39	.087	0.355	-	7.1	30.2	.13	205	4.5
May 20	7.47	980	9.0	14	234	89	53	.350	.34	1.250	2.50	≤.001	0.010	-	6.5	23.4	.31	131	4.1
June 18	8.55	660	1.3	8	148	61	50	.095	.02	1.390	1.05	.052	0.255	-	9.1	15.0	.07	83	4.5
July 6	8.54	1200	5.5	8	67	60	29	.042	.01	0.298	0.67	.059	0.585	-	5.7	12.0	.40	37	3.0
July 15	9.20	480	4.8	9	85	70	40	.072	.02	0.216	0.80	.066	0.300	-	6.1	14.6	.36	47	7.8
July 23	7.63	440	2.9	31	77	79	40	.165	.07	0.226	1.85	-	-	-	8.4	20.0	1.35	42	6.3
July 31	7.20	350	43.0	-	43	76	29	.705	.28	0.570	2.50	.043	1.66	-	4.7	17.8	6.75	24	4.7
Aug. 4	7.59	620	13.5	121	130	108	38	.260	.05	0.016	1.30	.006	1.04	-	5.0	18.8	6.50	71	5.5
Aug. 7	8.00	400	150.0	84	33	94	47	.568	.28	0.006	1.18	.068	1.68	-	6.6	20.5	-	19	16.1
Aug. 13	8.38	310	77.0	36	38	58	37	-	.23	0.020	1.02	.255	0.595	-	5.5	12.6	3.50	23	7.2
Aug. 20	7.91	450	14.0	11	47	103	54	.195	.15	0.014	1.12	.005	1.54	-	6.5	23.6	1.22	28	5.9
Oct. 9	7.98	710	16.4	-	147	98	47	.308	.27	0.006	0.88	.015	0.74	-	4.6	22.6	1.28	-	5.1
Nov. 2	7.80	520	30.0	12	44	124	85	.150	.09	0.008	0.65	.013	1.09	-	5.6	29.4	1.45	22	6.6

1022A.3

Table 8e: Lake Aquitaine outlet samples - 1981.

1981	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus Tot	Phosphorus SRP	Nitrogen NH_3	Nitrogen TKN	Nitrogen NO_2	Nitrogen NO_3	TC	TOC	TIC	Fe	Na	K
April 13	7.78	1250	5.2	5	305	94	49.5	.053	.020	.194	.79	.016	.465	-	4.2	23.8	0.31	179	4.75
May 7	7.92	1380	13.0	8	338	99	48.5	.081	.026	.260	.97	.015	.175	-	4.6	26.4	0.88	190	5.05
May 20	7.87	1280	13.0	10	318	100	50.0	.062	.022	.256	.92	.018	.245	-	3.9	24.8	0.80	191	5.05
June 18	8.43	1220	2.5	6	302	86	47.5	.058	.008	.128	.68	.020	.005	-	4.8	22.4	0.34	185	4.85
July 6	7.60	1140	4.7	11	266	85	47.5	.048	.004	.108	.77	.003	≤.005	-	4.3	19.0	0.32	165	4.65
July 15	8.57	1160	10.5	7	298	79	44.0	.038	.003	.060	.60	.001	≤.005	-	5.0	17.8	0.35	173	4.70
July 23	7.96	1160	2.0	6	267	83	53.0	-	.006	.100	-	.005	.005	-	4.4	19.6	0.29	166	4.90
July 31	7.74	1120	5.8	-	-	86	46.5	.048	.009	.010	.60	-	-	-	3.7	19.0	0.48	157	4.80
Aug. 4	8.42	1080	3.0	6	246	85	45.0	.038	.003	.020	.50	.004	≤.005	-	4.7	17.8	0.24	149	4.75
Aug. 7	8.46	1150	-	17	234	81	45.5	.060	.007	.020	.58	.020	.095	-	4.5	18.6	1.35	140	5.15
Aug. 13	8.15	990	2.7	8	223	78	39.0	.048	.008	.076	.60	.032	.170	-	4.0	18.2	0.80	129	5.15
Aug. 20	8.11	920	5.8	7	204	85	44.0	.105	.063	.004	.60	.062	.250	-	4.2	19.0	0.53	126	5.05
Oct. 9	7.97	740	10.0	-	155	100	46.5	.365	.320	.008	.85	.003	.740	-	4.5	22.8	1.02	-	4.90
Nov. 2	7.96	620	17.8	6	115	100	48.0	.092	.043	.212	.600	.065	.390	-	4.6	24.2	1.10	68	5.20

1022A.10

Table 9a: Lake Aquitaine lake station samples collected as composites through the euphotic zone - 1982

1982	pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				TC	TOC	TIC	Chlorophyll			Secchi disc
								TP	FRP	NH_3	TKN	NO_2	NO_3				a	b	Acidified a	
June 8	8.31	1010.	11.4	2.73	223	105	61	.053	.014	.128	.60	.017	.285	-	3.0	25.4	4.9	1.2	1.3	0.8
July 6	8.11	784	12.6	9.85	169	70.5	53.5	.035	.0075	.096	.60	.002	.015	-	3.3	16.2	11.5	1.0	10.2	0.8
19	8.22	800	8.5	5.48	172	81.9	66.5	.05	.0145	.162	.65	.004	.015	-	3.3	20.0	6.5	1.8	4.7	0.95
Sept.14	8.13	722	10.1	5.90	138	97.9	47.8	.046	.0150	.168	.65	.011	.084	-	4.8	22.8	19.4	0.4	18.4	1.2

Table 9b: Lake Aquitaine lake station samples collected from 1m above the bottom - 1982

1982	pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				Carbon			Fe	Na	K
								TP	FRP	NH_3	TKN	NO_2	NO_3	TC	TOC	TIC			
June 8	7.99	1080	15.2	8.36	247	113	60	.058	.009	.022	.60	.004	.375	-	2.9	27.4	.725	145	5.06
July 6	7.53	967	7.3	8.04	211	112.9	55.5	.038	.0075	.300	.85	.005	[1].005	-	3.1	25.6	.420	118	5.28
19	7.36	1080	5.7	6.86	235	138.9	48.9	.048	[1].002	.830	1.35	-	-	-	6.0	30.4	-	139	5.24
Sept.14	7.69	746	10.4	9.34	158	109.0	47.1	.046	.009	.246	.81	.014	.096	-	4.5	26.6	.583	83.2	5.74

[1]value may not be different from zero

Table 9c: Lake Aquitaine sample taken from the inlet above the sedimentation basin - 1982

1982	pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				Carbon			Fe	Na	K
								TP	FRP	NH_3	TKN	NO_2	NO_3	TC	TOC	TIC			
*Feb. 15	7.79	720	1150	32.5	147	182	32.5	1.86	.090	.356	3.4	.145	1.06	-	4.8	21.4	61	87	20.4
June 8	8.23	814	25	107.	107	160.1	107	.098	.034	.008	.63	.008	1.33	-	4.4	38	1.20	55.9	9.5
July 6	7.64	599	29	74.5	74	123.9	74.5	.160	.100	.280	1.33	.005	.745	-	4.5	26.4	1.56	39	8.7
19	7.46	592	10.6	72.	72	127.6	72.0	.165	.049	.252	1.33	.083	.565	-	-	-	.775	38.2	7.7
Sept. 14	7.27	536	715	62.4	46.4	-	62.4	1.10	.008	[1].002	3.70	.006	.029	-	*45.0	30.4	*36.63	25.4	7.54

*data not used in calculation of mean
[1]value may not be different from zero

Table 9d: Lake Aquitaine samples from the inlet below the sedimentation basin - 1982

1982	pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				Carbon			Fe	Na	K
								TP	FRP	NH_3	TKN	NO_2	NO_3	TC	TOC	TIC			
*Feb 15	7.81	965	485	518	221	115	35	.78	.082	.45	2.00	.072	.930	-	3.7	21.0	26.	-	13.4
June 8	7.88	540	60	18.7	62.5	109	72.5	.180	.034	.006	.88	.012	1.74	-	5.0	25.6	3.08	34.8	6.7
July 6	7.72	474	14.6	17.0	58.0	78.1	62.5	.120	.084	.740	1.45	.025	[1].005	-	4.2	17.6	.895	31.3	7.8
19	7.64	552	8.3	15.5	66.0	116.9	69.5	.08	.018	.144	.88	.089	.400	-	6.5	28.0	.955	35	7.46
Sept.14	8.19	437	2.8	4.82	34.4	120.9	52.5	.032	.004	.106	.55	.034	.126	-	4.3	25.6	.085	20.2	4.42

*Feb. data not used in calculation of mean.

[1]Value may not be different from zero

Table 9e: Lake Aquitaine outlet samples - 1982

1982	pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				Carbon			Fe	Na	K
								TP	FRP	NH_3	TKN	NO_2	NO_3	TC	TOC	TIC			
*Feb.15	7.29	540	110	285	108	71	27.5	.575	.210	.53	2.25	.073	[1].005	-	6.3	17.4	7.00	62	5.25
June 8	8.1	-	-	-	224	104.6	60.5	.045	.012	.088	.50	.017	.325	-	-	-	-	130	4.86
July 6	8.11	782	10.6	8.77	170	69.7	57.5	.030	.008	.106	.58	.002	[1].005	-	3.2	15.8	.345	96.8	5.18
19	8.37	804	8.30	5.5	172	81.5	67.5	.055	.006	.100	.68	.003	[1].005	-	3.5	20.0	.405	97.2	5.54
Sept.14	8.45	713	6.4	5.25	144	94.0	48	.037	.005	.100	.61	.010	.050	-	4.5	21.2	.307	81.4	5.64

*Feb. data not included in mean

[1]Value may not be different from zero

Table 10a: Lake Aquitaine - lake station samples collected as composites through the euphotic zone - 1983

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO4	Phosphorus		Nitrogen				TOC	TIC	Chlorophyll		Secchi disc
								Tot.	SRP	NH3	TKN	NO2	NO3			a	Acidified a	
May 19	8.39	577.0	6.50	5.45	88.50	98.6	55.93	.029	*.002	.082	.540	.0150	.425	3.7	23.8	6.2	5.0	1.00
" 31	8.51	528.0	13.80	8.62	83.50	96.4	51.60	.043	.009	.126	.580	.0130	.252	3.7	23.4	8.1	5.3	0.75
June 14	8.67	484.0	7.50	9.84	92.00	68.5	49.38	.048	.006	.106	.820	.0045	.001	3.7	16.2	8.5	6.9	1.00
30	8.40	501.0	5.20	7.68	78.00	108.3	53.70	.038	*.002	.072	.560	.0040	.011	4.1	17.7	5.3	4.0	1.00
July 12	8.52	507.0	3.40	5.52	83.00	78.7	52.30	.021	*.001	.020	.050	*.0010	.000	4.2	18.2	3.7	3.0	1.20
26	8.18	522.0	5.50	4.33	44.30	83.6	54.00	.024	.003	.056	.440	*.0015	.000	3.9	21.2	1.9	1.9	1.55
Aug. 9	8.27	522.0	5.80	5.92	-	88.1	53.16	.026	*.002	.036	.440	.0020	.008	3.4	21.4	6.7	4.8	1.10
22	8.75	440 0	14.50	19.20	67.30	63.0	46.65	.038	*.001	*.002	.530	*.0015	.000	5.0	14.4	4.6	2.6	0.40
Sept.27	7.80	437.0	8.30	11.70	64.70	90.4	41.56	.044	.003	.076	.640	.0070	.073	4.1	22.5	10.9	10.2	0.80

*Value tentative

Table 10b: Lake Aquitaine - lake station samples collected from 1 m above bottom - 1983

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus		Nitrogen				TOC	TIC	Fe	Na	K
								Tot.	SRP	NH_3	TKN	NO_2	NO_3					
May 19	8.32	575.0	8.00	5.120	89.00	101.3	56.36	.029	.0030	.104	0.540	.014	.451	3.7	23.8	.180	54.20	3.34
31	8.08	548.0	7.60	13.10	86.00	101.6	51.20	.047	.0100	.216	0.530	.014	.246	3.6	25.4	.500	51.20	3.38
June 14	7.71	549.0	16.00	14.60	92.00	104.1	52.24	.063	.0095	*.004	0.760	.315	.020	3.4	26.8	.630	50.70	3.36
30	7.50	572.0	4.00	10.20	83.00	119.8	44.38	.080	*.0015	.370	1.550	.002	*.003	4.2	30.8	.425	52.00	3.46
July 12	7.47	559.0	5.30	8.34	86.00	119.2	42.49	.019	*.0010	.440	0.047	.002	.000	4.1	30.2	.195	49.70	3.63
26	7.39	596.0	4.70	16.80	84.40	152.8	26.19	.113	*.0015	.650	1.750	.002	.000	4.7	39.0	.495	53.60	3.52
Aug. 9	7.55	550.0	9.50	11.20	83.50	113.1	42.80	.051	.0060	.160	0.900	.002	*.005	4.2	29.1	.355	49.90	3.92
22	8.05	510.0	13.20	17.20	58.40	106.9	43.91	.050	*.0010	.096	0.700	.004	*.007	4.3	26.9	.250	44.30	4.02
Sept. 27	7.79	447.0	10.90	-	63.50	91.2	41.97	.037	*.0020	.082	0.560	.006	.049	4.0	22.6	.520	37.80	3.98

*Value tentative

Table 10c: Lake Aquitaine - samples from the inlet below the sedimentation basin - 1983

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus		Nitrogen				TOC	TIC	Fe	Na	K
								Tot.	SRP	NH_3	TKN	NO_2	NO_3					
May 19	7.79	460.0	5.60	14.50	53.00	87.6	62.00	.074	.022	.560	1.130	.002	*.003	4.2	21.6	0.110	31.40	3.65
31	7.75	365.0	53.00	42.40	36.80	88.7	45.57	.195	.041	-	0.750	.020	.000	4.3	21.9	3.250	22.30	3.98
June 14	8.20	460.0	2.50	10.80	47.20	98.3	64.86	.048	.013	.268	0.880	.004	*.001	3.8	24.2	0.110	29.70	4.66
30	7.65	464.0	12.50	9.63	47.70	71.7	53.05	.054	.0165	.140	0.850	.036	.369	5.4	28.0	0.524	25.40	5.32
July 12	7.86	562.0	11.50	9.52	53.30	79.6	62.90	.051	.005	.140	0.810	.005	.021	6.0	36.0	0.210	31.60	6.30
26	7.77	585.0	9.50	13.40	36.50	134.7	76.50	.055	*.001	*.004	0.870	.002	.000	5.5	33.5	0.200	36.60	7.10
Aug. 9	7.62	422.0	81.00	60.10	*35.70	123.0	43.49	.173	.047	.800	1.400	.029	.017	5.7	31.1	4.075	22.80	6.54
22	8.02	259.0	200.00	184.00	*19.30	78.5	*32.28	.335	.060	.046	1.250	.353	.422	3.9	19.3	10.750	11.50	7.22
Sept.27	8.39	347.0	36.00	12.60	27.40	95.6	42.65	.136	.069	.016	0.740	.056	.589	3.7	22.7	1.520	16.30	3.92

*Value tentative

Table 10d: Lake Aquitaine - samples from the inlet above the sedimentation basin - 1983

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SC.	Phosphorus		Nitrogen				TOC	TIC	Fe	Na	K
								Tot.	SRP	NH_3	TKN	NO_2	NO_3					
May 19	7.58	213.0	95.00	198.00	17.60	72.9	*21.22	.400	.085	.420	1.750	.0420	0.248	5.2	14.0	8.200	12.00	2.70
31	7.53	364.0	185.00	170.00	31.40	99.9	43.00	.415	.054	.400	1.350	.1650	0.660	6.7	24.3	12.300	21.30	6.70
June 14	8.40	466.0	34.00	26.40	47.00	104.3	63.44	.070	.019	.112	0.550	.0670	0.048	3.7	25.4	1.375	29.40	5.14
30	7.75	495.0	16.00	14.20	50.60	118.7	57.65	.065	.016	.082	0.660	.0430	0.432	5.2	30.3	0.619	27.30	5.46
July 12	7.83	683.0	11.50	15.90	54.40	195.9	86.40	.076	.144	.128	0.034	.2100	0.720	4.8	49.0	0.400	30.60	8.50
26	7.60	628.0	5.50	18.30	40.10	163.1	81.00	.295	.154	.010	0.900	.0305	0.245	5.0	43.0	0.250	36.00	7.16
Aug. 9	7.45	519.0	76.00	56.40	*48.70	144.4	55.41	.178	.066	.298	1.380	.8900	-	5.1	36.6	3.725	28.70	6.96
22	8.17	530.0	178.00	170.00	*43.30	145.5	*73.45	.325	.118	.004	0.850	.0295	1.930	5.2	33.8	9.700	26.30	10.40
Sept.27	8.25	595.0	13.70	5.07	49.30	178.4	77.70	.265	.130	.214	0.670	.1010	0.734	2.8	46.0	0.550	28.60	4.36

*Value tentative

Table 1Ce: Lake Aquitaine - outlet samples - 1983

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus		Nitrogen				TOC	TIC	Fe	Na	K
								Tot.	SRP	NH_3	TKN	NO_2	NO_3					
May 19	8.49	570.0	6.80	6.88	88.50	98.0	52.20	.024	.002	.064	0.490	.0145	0.391	3.6	23.2	0.135	54.50	3.28
31	7.31	693.0	70.00	-	102.50	127.9	77.90	.360	.042	.196	2.000	.500	1.250	16.8	32.6	-	60.10	10.30
June 14	8.71	486.0	7.00	7.48	92.00	69.3	51.08	.033	.003	.076	0.500	.003	0.002*	3.9	16.5	0.225	48.80	3.32
30	8.51	501.0	5.00	6.71	82.00	73.1	52.85	.029	.001*	.040	0.530	.003	0.007*	4.3	17.4	0.231	48.50	3.50
July 12	8.60	508.0	4.00	5.17	82.00	128.2	53.00	.022	.001*	.028	0.540	.0015*	0.004*	4.2	18.2	0.135	47.90	3.72
26	-	-	-	-	-	-	-	NO OUTFLOW			-	-	-	-	-	-	-	-
Aug. 9	8.40	519.0	6.30	6.96	79.10	88.8	53.12	.025	.001*	.020	0.520	.001*	0.000	4.2	21.2	0.210	48.20	4.06
22	8.59	439.0	16.60	22.60	67.30	54.3	46.72	.043	.001*	.004*	0.570	.001*	0.005*	4.9	14.9	0.485	42.40	3.90
Sept.27	7.96	447.0	10.80	11.40	64.30	40.7	41.54	.040	.002*	.058	0.580	.005	0.050	4.1	22.5	0.420	36.80	3.96

*Value tentative

Table 11a: Lake Aquitaine - lake station samples collected as composites through the euphotic zone - 1984

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus		NH_3	Nitrogen		NO_3	TOC	TIC	Chlorophyll		Secchi disc
								Tot.	SRP		TKN	NO_2				a	Acidified a	
May 17	8.18	1206	10.1	23.280	277.70	90.2	55.00	.060	<.005	.054	.650	.025	.515	3.3	22.8	18.0	14.0	0.75
June 5	8.56	1027	11.6	7.056	189.10	89.3	54.13	.036	.008	.042	.650	.026	.324	3.5	21.1	7.4	-	0.9
19	8.03	980	19.1	4.165	204.90	85.1	51.44	.059	.015	.176	.800	.016	.324	3.5	20.5	4.8	-	0.6
July 5	8.61	945	4.2	3.736	186.50	83.4	69.62	.025	.003	.102	.560	.0125	.2375	4.6	19.6	10.4	6.7	1.2
16	8.57	843	7.6	4.250	161.95	79.1	56.19	.021	.0055	.050	.470	.0155	.1695	4.2	18.4	9.3	-	1.1
Aug. 1	8.51	835	9.6	8.172	166.45	76.6	53.75	.027	.000	.040	.560	.0045	.0155	4.2	17.0	8.1	6.7	0.8
15	8.69	773	8.9	8.080	155.35	69.0	52.85	.025	.003	<.002	.590	.0025	.0475	5.2	15.1	9.4	0.6	0.9
28	8.64	800	4.2	6.324	167.40	81.9	*50.08	.027	<.003	.048	.590	.002	.013	4.8	18.5	7.8	7.1	1.3
Sept.18	8.21	745	7.5	7.404	142.30	91.3	47.59	.035	<.002	.086	.730	.013	.122	4.9	22.1	8.5	5.6	1.0
Oct. 9	8.18	750	4.3	4.340	131.70	96.7	49.84	.050	.005	.096	.710	.0105	.1195	5.1	23.1	12.4	13.2	1.7
Nov. 6	8.40	700	10.2	8.752	133.95	100.5	47.30	.048	.005	.064	.590	.0125	.1525	4.7	23.5	4.3	3.9	0.7

*Value tentative

Table 11b Lake Aquitaine - lake station samples collected 1m above bottom - 1984

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO.	Phosphorus		Nitrogen				TOC	TIC	Fe	Na	K
								Tot.	SRP	NH_3	TKN	NO_2	NO_3					
May 17	8.14	1206	9.6	10.910	276.25	92.7	55.35	.055	<.003	.054	.610	.024	.526	3.2	4.7	.365	174.0	3.96
June 5	8.13	1055	26.0	12.80	234.35	96.4	52.15	.043	.0145	.130	.730	.0355	.3945	3.4	24.2	1.050	142.0	4.40
19	7.84	965	15.0	7.103	240.00	106.7	47.16	.054	.007	.238	.710	.0110	.079	3.2	26.8	.625	147.0	4.00
July 5	7.82	1089	13.0	8.084	214.30	117.4	53.98	.049	<.015	.494	1.130	<.015	-	4.2	32.0	.295	146.0	4.04
16	7.68	1147	4.4	8.896	244.00	149.7	27.30	.040	.0035	1.420	2.200	.0065	.0335	4.1	35.7	.485	153.0	4.20
Aug. 1	7.96	931	13.1	10.300	191.50	104.3	46.56	.052	.000	.324	.990	.007	.018	4.0	25.8	.280	115.0	4.25
15	6.79	772	4.8	6.222	153.30	67.4	53.59	.022	<.0005	<.002	.560	<.0015	.0435	5.1	14.7	.135	93.3	4.76
28	7.53	920	6.4	10.720	194.60	110.3	*39.58	.043	.003	.520	1.320	.0055	.0045	4.8	27.1	.190	120.0	4.46
Sept.18	8.05	740	6.5	6.654	143.90	91.4	47.60	.031	<.002	.114	.640	.014	.126	4.7	22.4	.205	88.0	4.86
Oct. 9	8.03	755	4.2	4.200	119.80	97.4	50.22	.027	.003	.074	.600	.0115	.1085	5.1	22.8	.145	84.7	5.06
Nov. 6	8.19	700	10.3	8.920	114.75	100.4	45.26	.040	.0035	.062	.660	.0125	.1525	4.8	23.4	.445	75.7	5.02

*Value tentative

Table 11c: Lake Aquitaine - samples from the inlet above the sedimentation basin - 1984

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus		Nitrogen				TOC	TIC	Fe	Na	K
								Tot.	SRP	NH_3	TKN	NO_2	NO_3					
May 17	8.01	967	17.9	23.81	179.95	122.2	86.45	.100	.052	.122	1.94	.028	1.022	8.6	27.5	0.620	93.5	6.36
June 5	8.13	860	47.5	32.62	96.85	165.5	89.30	.149	.064	.106	.97	.0685	1.0515	4.6	41.5	1.70	59.8	7.60
19	7.77	570	150.0	104.10	70.20	114.9	*54.66	.323	.0585	.082	1.72	.082	1.018	4.5	27.3	6.60	34.2	7.20
July 5	8.49	638	10.5	9.13	72.75	116.5	88.45	.054	.018	.162	.74	.0675	.3675	7.0	28.0	0.245	39.2	5.56
16	8.07	590	-	551.50	*58.05	134.6	*77.44	.700	.104	.152	1.29	.099	.811	4.1	29.9	24.00	35.4	11.80
Aug. 1	8.12	692	15.5	15.29	63.65	147.7	99.92	.218	.0835	.368	1.65	.126	1.234	9.7	36.0	0.465	39.4	11.20
15	7.70	654	69.0	348.10	58.10	166.9	74.42	.606	.0915	.226	3.02	.119	1.101	11.6	42.0	15.50	33.7	14.50
28	7.45	630	71.0	68.20	*55.52	127.3	*90.84	.398	.100	.022	3.20	1.160	1.480	48.5	31.7	3.60	34.3	9.39
Sept. 18	7.75	685	25.0	18.97	63.00	164.6	83.59	.148	.0675	.192	.87	.124	.751	4.4	42.0	1.13	36.4	6.34
Oct. 9	8.05	855	13.4	12.52	123.30	137.9	88.80	.159	.070	.056	-	.073	2.170	-	-	-	70.9	5.96
Nov. 6	6.90	555	195.0	636.50	*51.12	236.2	*69.70	.560	.0465	.010	1.38	.0775	.3075	*4.5	*33.7	-	26.4	7.52

*Value tentative

Table 11d: Lake Aquitaine - samples from the inlet below the sedimentation basin - 1984

Date		pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus		Nitrogen				TOC	TIC	Fe	Na	K
									Tot.	SRP	NH_3	TKN	NO_2	NO_3					
May	17	8.21	683	13.6	12.47	130.65	63.7	75.23	.074	<.0030	<.004	1.12	.0622	.233	5.9	12.7	0.105	75.40	4.88
June	5	8.36	552	22.0	13.04	65.30	97.9	60.82	.058	.0115	.026	.64	.0505	.6895	4.6	24.0	0.705	39.70	4.60
	19	8.15	366	194.0	78.92	46.66	74.5	*34.59	.313	.1060	.046	1.65	.0905	1.0595	17.8	18.8	8.350	25.60	7.04
July	5	8.22	542	15.3	9.32	64.10	96.0	69.30	.070	.0085	.234	1.03	.051	.769	7.4	23.4	0.275	30.10	4.74
	16	8.12	466	23.0	24.64	55.65	73.3	66.04	.081	.0045	.180	1.14	.073	.507	6.1	16.6	0.560	35.20	5.23
Aug.	1	8.33	587	8.8	11.49	68.00	97.7	78.44	.060	.0000	.122	1.20	.485	.1215	8.4	22.4	0.140	40.30	8.60
	15	8.25	562	29.0	14.05	57.15	131.2	59.75	.082	.0070	.018	1.15	.0810	.439	9.9	30.5	0.850	30.64	8.02
	28	8.07	540	6.0	10.76	51.51	129.1	*53.90	.114	.0095	.170	1.40	.052	.423	8.4	31.8	0.230	31.90	6.84
Sept.	18	7.90	460	16.1	23.16	43.55	102.5	54.37	.118	.0645	.158	1.02	.085	.835	6.3	25.2	2.175	24.00	6.75
Oct.	9	7.67	410	86.0	80.23	*31.34	77.8	*52.63	.180	.0345	.126	1.55	.0795	.9205	7.9	19.7	4.375	22.90	4.62
Nov.	6	7.75	440	51.0	40.97	39.46	104.0	54.96	.153	.0270	.046	1.05	.0505	.7095	5.7	25.4	2.200	21.90	5.35

*Value tentative

Table IIe: Lake Aquitaine - outlet samples - 1984

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus		Nitrogen				TOC	TIC	Fe	Na	K
								Tot.	SRP	NH_3	TKN	NO_2	NO_3					
May 17	6.91	1206	9.20	8.368	284.0	92.7	56.25	.036	<.003	.044	.570	.0240	.5360	3.2	4.7	0.330	177.0	3.94
June 5	8.63	1045	9.85	4.564	233.7	89.0	52.67	.026	.006	.022	.530	.0245	.4205	3.7	21.1	0.375	141.0	4.08
19	8.13	979	16.20	4.040	209.0	84.7	49.57	.057	.0075	.140	.740	.0145	.3255	3.4	20.5	0.730	129.0	4.28
July 5	8.80	943	4.20	2.584	199.5	81.3	63.91	.020	<.0015	.058	.460	.0125	.1325	4.2	19.0	0.195	122.0	4.16
16	8.64	841	6.00	4.060	155.0	79.1	56.48	.017	.0035	.042	.470	.0150	.1550	4.0	18.2	0.245	98.8	4.13
Aug. 1	8.55	834	9.30	7.238	161.6	75.5	53.75	.023	.0000	.030	.520	.0040	.0110	4.2	17.0	0.155	106.0	4.36
15	7.66	941	15.50	12.160	184.2	110.4	38.94	.051	<.001	.472	1.360	.0045	.0500	4.6	28.0	0.210	125.0	4.34
28	8.74	800	3.90	4.512	165.1	81.3	*50.24	.019	<.0015	.012	.510	.0025	.0125	4.6	18.8	0.115	105.0	4.76
Sept. 18	8.31	740	8.60	8.975	144.5	90.7	47.60	.032	<.0015	.078	.730	.0135	.1165	4.8	22.1	0.145	85.9	4.90
Oct. 9	8.36	750	4.60	3.260	127.4	96.7	48.70	.022	.006	.042	.570	.0130	.1170	5.0	22.7	0.100	83.0	4.90
Nov. 6	8.17	700	11.30	8.544	111.8	99.7	46.81	.037	.006	.056	.630	.0130	.1520	4.6	23.4	0.385	78.2	4.94

*Value tentative

Table 12a: Lake Aquitaine - lake station samples collected as composites through the euphotic zone - 1985

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus		Nitrogen				TOC	TIC	Chlorophyll		Secchi disc
								Tot.	SRP	NH_3	TKN	NO_2	NO_3			a	Acidified a	
May 7	8.44	1167.0	5.40	*0.996	228.70	89.6	44.90	0.037	0.0045	0.092	0.670	0.023	0.957	3.6	21.8	4.0	0.6	1.1
June 13	8.71	1082.0	11.60	8.592	259.50	69.6	48.35	0.047	*0.0025	0.112	0.840	0.0170	0.168	3.9	15.2	11.0	8.0	0.8
July 11	7.99	849.0	1.37	-	166.20	75.2	43.48	0.103	0.0295	0.260	1.150	0.0250	0.240	4.8	17.8	7.6	2.5	0.4
Aug. 1	8.64	798.0	16.40	12.940	165.40	76.2	41.50	0.052	*0.0020	0.150	0.820	0.0055	0.005	4.7	16.8	25.8	20.0	0.6
Oct. 7	8.45	503.0	17.50	13.030	86.25	90.7	27.50	0.050	0.0050	0.228	1.080	0.205	0.135	5.4	22.0	35.6	19.0	0.7

*Value tentative

Table 12b: Lake Aquitaine - lake station samples collected from 1 m above the bottom - 1985

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus			Nitrogen			TOC	TIC	Fe	Na	K
								Tot.	SRP	NH_3	TKN	NO_2	NO_3					
May 7	7.96	1197.0	7.20	23.720	275.50	118.2	34.25	0.034	0.0070	0.622	1.250	0.0190	0.616	3.7	29.6	0.345	156.70	4.460
June 13	7.67	1219.0	33.00	9.660	274.15	152.6	20.65	0.067	0.0100	1.430	2.270	0.0070	-	4.1	35.0	0.395	161.70	4.710
July 11	7.66	1125.0	3.00	-	233.40	136.4	24.85	0.090	0.0140	1.860	2.580	0.0070	0.010	4.4	35.0	0.810	145.00	4.550
Aug. 1	7.75	987.0	9.10	7.990	198.90	115.6	32.35	0.045	*0.0015	1.510	2.170	0.0040	0.003	4.5	29.2	0.434	119.20	4.310
Oct. 7	8.28	504.0	17.70	12.360	87.85	90.4	27.45	0.049	0.0040	0.278	1.080	0.0160	0.137	5.3	22.2	0.390	51.70	4.170

*Value tentative

Table 12c: Lake Aquitaine - samples from the inlet above the sedimentation basin - 1985

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus		Nitrogen				TOC	TIC	Fe	Na	K
								Tot.	SRP	NH_3	TKN	NO_2	NO_3					
May 7	8.21	1013.0	58.00	-	162.15	159.7	96.05	0.133	0.0460	0.170	1.020	0.0455	1.415	4.2	41.0	1.450	95.96	6.60
June 13	8.08	914.0	21.00	9.712	140.85	167.4	80.25	0.145	0.0610	0.350	1.970	0.0975	0.728	7.9	38.0	0.220	74.92	5.64
July 11	8.28	918.0	3.20	2.252	116.50	201.4	106.90	0.148	0.0840	0.192	0.530	0.1110	1.109	2.9	46.0	0.090	62.24	5.60
Aug. 1	7.97	650.0	3.40	4.868	72.55	143.9	66.96	0.139	0.0880	0.498	1.290	0.0210	0.459	8.9	34.8	0.174	39.22	5.17
Oct. 7	8.35	696.0	8.40	6.640	70.30	179.8	83.70	0.118	0.0650	0.044	0.650	0.0590	0.551	3.4	37.0	0.340	36.40	4.27

Table 12d: Lake Aquitaine - samples from the inlet below the sedimentation basin - 1985

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus		Nitrogen				TOC	TIC	Fe	Na	K
								Tot.	SRP	NH_3	TKN	NO_2	NO_3					
May 7	8.49	1140.0	20.00	11.040	244.85	87.8	45.15	0.057	0.0035	0.054	0.730	0.0265	0.9735	3.5	21.2	0.728	165.00	4.39
June 13	7.89	847.0	19.80	9.531	142.35	139.4	62.35	0.149	0.0425	0.458	2.700	0.0735	0.4165	11.0	33.8	0.295	78.46	5.78
Aug. 1	8.43	759.0	12.60	12.910	143.35	82.9	45.15	0.071	*0.0025	0.232	1.010	0.0095	0.0355	6.0	18.8	0.259	90.09	4.41
Oct. 10	8.77	447.0	28.00	16.380	46.50	105.3	46.50	0.093	0.0255	0.050	0.840	0.0525	0.4225	5.6	24.2	0.890	28.10	3.89

*Value tentative

Table 12e: Lake Aquitaine - outlet samples - 1985

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus		Nitrogen				TOC	TIC	Fe	Na	K
								Tot.	SRP	NH_3	TKN	NO_2	NO_3					
May 7	8.46	1167.0	5.80	2.064	277.20	89.7	43.90	0.030	*0.0020	0.060	0.620	0.0220	0.988	3.4	21.6	0.230	154.20	4.29
June 13	8.60	1084.0	13.30	8.068	259.10	70.6	43.60	0.046	0.0040	0.146	0.890	0.0175	0.1725	4.0	15.8	0.205	151.50	4.63
Aug. 1	8.68	796.0	16.30	13.180	145.20	75.7	41.25	0.056	*0.0025	0.124	0.880	0.0055	*0.0045	4.8	16.4	0.322	94.11	4.220
Oct. 7	8.40	503.0	24.00	15.940	84.35	90.1	27.10	0.062	0.0045	0.206	1.400	0.0195	0.1355	5.4	22.0	0.320	50.40	4.120

*Value tentative

Table 13a: Lake Aquitaine - lake station samples collected as composites through the euphotic zone - 1986

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus		Nitrogen				TOC	TIC	Chlorophyll		Secchi disc
								Tot.	SRP	NH_3	TKN	NO_2	NO_3			a	Acidified a	
May 12	-	-	3.40	4.0	458.50	-	57.50	0.031	0.0055	0.062	0.670	0.0240	0.666	2.3	18.2	2.2	1.0	1.6
June 9	8.56	1500.0	6.80	8.3	370.00	83.7	51.30	0.056	0.0095	0.136	0.880	0.0250	0.445	3.1	18.8	14.1	10.3	1.1
July 8	8.62	1263.0	10.70	10.8	339.00	69.0	48.20	0.054	0.0035	0.118	0.830	0.0215	0.179	3.6	15.0	16.1	12.9	1.1
Aug. 11	8.15	975.0	7.70	7.1	236.00	60.3	42.20	0.041	*0.0020	0.062	0.670	0.0040	0.013	5.4	13.2	12.7	10.8	0.9

*Value tentative

Table 13b: Lake Aquitaine - lake station samples collected from 1 m above the bottom - 1986

Date	pH	Cond	Turb.	Susp. Solids	Cl	Alk.	SO4	Phosphorus			Nitrogen			TOC	TIC	Fe	Na	K
								Tot.	SRP	NH3	TKN	NO2	NO3					
May 12	-	-	7.40	5.3	451.50	-	55.60	0.036	0.0010	0.154	0.870	0.0270	0.613	2.4	19.8	0.160	255.00	4.470
June 9	7.77	1690.0	6.40	8.2	423.00	103.8	47.20	0.103	*0.0025	0.318	1.550	0.0140	0.196	3.1	24.8	0.400	268.00	4.530
July 8	8.07	1470.0	9.80	9.8	356.00	104.2	41.10	0.052	0.0035	0.688	1.390	0.0110	0.109	3.4	24.6	0.300	227.00	4.550
Aug. 11	7.93	1450.0	13.10	15.7	339.00	129.2	30.55	0.063	*0.0025	1.570	2.480	0.0025	0.003	4.2	30.6	0.450	214.00	4.750

*Value tentative

Table 13a: Lake Aquitaine - samples from the inlet above the sedimentation basin - 1986

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus		Nitrogen				TOC	TIC	Fe	Na	K
								Tot.	SRP	NH_3	TKN	NO_2	NO_3					
May 12	-	-	9.40	14.8	887.50	-	123.00	0.133	0.0025	0.096	1.800	0.0645	0.2955	2.4	19.2	0.140	5.5.00	6.460
June 9	8.08	1420.0	4.70	9.0	283.00	157.7	97.35	0.136	0.015	0.258	1.260	0.0760	1.474	5.7	37.6	0.190	173.00	6.610
July 8	8.79	896.0	11.50	10.0	161.00	146.7	69.80	0.120	0.0040	0.076	1.650	0.0745	0.8205	8.1	32.4	0.280	94.40	5.070
Aug. 11	8.05	768.0	73.60	43.1	126.00	145.2	64.40	0.155	0.0600	0.426	0.975	0.1730	0.9470	5.5	34.2	2.700	70.80	4.850

Table 10a: Lake Aquitaine - samples from inlet below the sedimentation basin - 1986

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO$_4$	Phosphorus		Nitrogen				TOC	TIC	Fe	Na	K
								Tot.	SRP	NH_3	TKN	NO_2	NO_3					
May 12	-	-	6.90	7.7	468.50	-	56.75	0.035	0.0016	0.048	0.720	0.025	0.649	2.4	18.0	0.750	275.00	4.540
June 9	8.69	1900.0	6.70	9.0	367.00	81.2	52.95	0.051	0.0035	0.094	0.790	0.025	0.455	3.0	18.0	0.240	236.00	4.530
July 8	8.67	1244.0	13.50	10.8	326.00	75.9	49.65	0.061	0.0035	0.132	0.950	0.025	0.245	3.9	16.6	0.250	197.00	4.450
Aug. 11	8.60	930.6	36.00	21.1	229.00	70.5	40.60	0.060	0.0065	0.200	0.875	0.017	0.083	5.0	16.0	1.000	141.00	4.180

Table 13e: Lake Aquitaine - outlet samples - 1986

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO.	Phosphorus			Nitrogen			TOC	TIC	Fe	Na	K
								Tot.	SRP	NH_3	TKN	NO_2	NO_3					
May 12	-	-	5.60	4.2	461.50	-	59.00	0.026	0.0005	0.034	0.610	0.0250	0.6800	2.4	18.0	5.400	267.00	4.530
June 9	8.70	1500.0	6.50	7.2	372.00	83.2	53.15	0.041	0.0045	0.062	0.690	0.0240	0.4360	2.9	18.4	0.240	239.00	4.460
July 8	8.65	1257.0	11.60	11.9	322.00	65.3	48.10	0.042	*0.0025	0.090	0.780	0.0215	0.1035	3.5	14.0	0.220	206.00	4.350
Aug. 11	8.29	975.0	9.60	7.1	238.00	59.9	43.25	0.029	0.0030	0.008	0.590	0.0045	*0.0305	4.3	12.8	0.290	157.00	4.050

*Value tentative

Table 14 a: Lake Wabukayne lake station samples collected as composites through the euphotic zone - 1977

		pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				TC	TOC	TIC	Chlorophyll a	Chlorophyll Acidified a	Secchi disc
									Tot.	DR	NH_3	TKN	NO_2	NO_3						
1977																				
May	10	8.28	585	5.8	5.1	-	-	-	.031	.003	<.002	.740	.034	2.705	36	3	33	-	-	1.3
	17	8.27	620	5.0	5.2	57.5	-	-	.026	.002	.056	.770	.032	1.860	38	10	28	-	-	2.1
	25	8.05	560	20	9.5	60	-	-	.036	.008	.112	.800	.038	2.260	38	11	27	-	-	0.5
	31	8.10	570	8.8	4.0	55	-	-	.023	.005	.084	.810	.041	1.340	33	11	22	-	-	1.9
June	7	7.96	510	27	11.0	50	-	-	.044	.023	.090	.820	.045	1.400	30	6	24	-	-	0.3
	14	8.11	540	5.0	3.9	55	-	-	.021	.003	.080	.680	.034	1.410	33	9	24	-	-	1.7
	21	8.01	495	14	3.7	47.5	-	-	.024	.009	.108	.700	.038	.912	33	10	23	-	-	1.0
	28	7.93	385	34	10	33	-	-	.060	.032	.108	.640	.051	1.200	23	8	15	-	-	0.4
July	5	7.96	420	14	3.3	37.5	-	-	.024	.012	.108	.590	.049	1.150	29	10	19	-	-	0.9
	8	7.98	360	190	81	29.5	-	-	.196	.145	.070	1.000	.100	1.000	28	9	19	-	-	0.06
	12	7.89	380	32	6.8	29	-	-	.050	.032	.096	.660	.059	1.490	27	10	17	-	-	0.5
	19	8.21	420	15	5.3	34	-	-	.027	.013	.064	.680	.055	1.490	27	8	19	-	-	1.4
	26	8.11	470	14	4.2	41.5	-	-	.028	.012	.070	.690	.046	1.270	32	20	12	-	-	1.2
Aug.	3	7.67	360	64	13	28.5	-	-	.110	.110	.122	.950	.074	1.670	26	11	15	-	-	0.25
	9	7.96	330	150	36	25.0	-	-	.180	.070	.180	1.050	.078	1.020	25	8	17	-	-	0.14
	16	7.93	360	30	7.5	26.0	-	-	.034	.021	.100	.200	.067	1.110	25	7	18	-	-	0.5
	23	7.92	340	47	14	23.5	-	-	.080	.038	.084	.740	.067	1.280	23	6	17	-	-	0.3
	31	8.07	370	4.6	2.6	25.5	-	-	.021	.003	.050	.610	.050	.970	27	11	16	-	-	2.1
Sept.	8	8.00	370	12	-	25.0	-	-	.022	.005	.070	.650	.038	.797	29	11	18	-	-	1.3
	19	7.82	325	70	20	22.0	-	-	.122	.100	.106	1.100	.068	.927	30	10	20	-	-	0.3
Oct.	4	7.24	325	98	34	26	-	-	.292	.130	.026	1.200	.044	1.610	36	12	24	-	-	0.14
	21	7.68	441	32	10	30	-	-	.111	.068	.138	1.010	.035	1.030	42	10	32	-	-	0.35

Table 14 b: Lake Wabukayne main inlet samples - 1977

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus Tot.	Phosphorus DR	Nitrogen NH_3	Nitrogen TKN	Nitrogen NO_2	Nitrogen NO_3	TC	TOC	TIC	Chlorophyll a	Chlorophyll Acidified a	Secch disc
1977																			
May 3	7.02	580	42	-	53	-	-	.084	.042	.004	.780	.036	2.560	38	12	26	-	-	-
10	8.31	680	8.8	-	-	-	-	.042	.002	<.002	.730	.031	2.690	41	5	36	-	-	-
17	8.21	670	5.8	5.5	65	-	-	.026	.003	.044	.740	.032	1.820	38	8	30	-	-	-
25	8.07	560	16	9.2	58	-	-	.024	.008	.106	.880	.039	2.010	31	4	27	-	-	-
31	8.12	570	8.4	9.2	58	-	-	.027	.006	.084	.770	.041	1.700	32	9	23	-	-	-
June 7	7.99	570	35	40	57	-	-	.080	.019	.080	.900	.045	1.550	33	8	25	-	-	-
14	8.12	540	5.0	2.2	55	-	-	.017	.002	.076	.640	.034	1.440	33	9	24	-	-	-
21	8.01	510	12	2.9	50	-	-	.020	.008	.100	.650	.036	1.210	33	10	23	-	-	-
28	7.81	415	18	4.8	36.5	-	-	.032	.015	.106	.600	.041	1.210	24	7	17	-	-	-
July 5	8.09	430	14	7.2	38.5	-	-	.031	.011	.082	.670	.047	1.170	30	11	19	-	-	-
8	8.02	405	80	21	35.5	-	-	.124	.081	.092	.800	.073	1.370	27	3	24	-	-	-
12	7.78	415	50	19.0	35.5	-	-	.064	.036	.032	.660	.065	1.480	30	11	19	-	-	-
19	6.65	435	17	26	36	-	-	.041	.010	.040	.640	.051	1.490	28	8	20	-	-	-
26	8.18	500	10	3.8	45.5	-	-	.035	.015	.054	.690	.042	1.150	33	12	21	-	-	-
Aug. 3	7.71	365	57	8.0	28.5	-	-	.091	.057	.118	.850	.066	1.580	24	9	15	-	-	-
9	8.04	355	72	16	26.5	-	-	.145	.070	.118	.900	.078	1.190	24	7	17	-	-	-
16	7.96	375	46	28	27.5	-	-	.088	.025	.025	.820	.067	1.140	27	9	18	-	-	-
23	7.63	350	40	8.8	24.0	-	-	.070	.038	.088	.720	.064	1.240	23	6	17	-	-	-
31	8.17	375	4.5	1.9	26.5	-	-	.015	.004	.046	.590	.047	.953	28	11	17	-	-	-
Sept. 8	8.15	405	12	-	29.5	-	-	.033	.009	.036	.740	.037	.803	30	11	19	-	-	-
19	8.12	890	88	92	98	-	-	.094	.047	.006	.840	.056	1.350	43	11	32	-	-	-
Oct. 4	7.91	550	36	13	45.5	-	-	.154	.081	.006	1.000	.015	.665	52	17	35	-	-	-
21	7.90	770	13	9.8	73	-	-	.048	.017	.026	.570	.052	1.010	58	9	49	-	-	-

Table 14c: Lake Wabukayne inlet #2 samples - 1977

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				TC	TOC	TIC	Chlorophyll		Secchi disc
								Tot.	DR	NH_3	TKN	NO_2	NO_3				a	Acidified a	
1977																			
July 8	7.96	410	95	53	32	-	-	.306	.087	.124	1.960	.780	1.020	29	6	23	-	-	-
Aug. 16	7.01	280	180	1700	28	-	-	1.170	.105	.160	4.000	.115	1.560	72	44	28	-	-	-
23	8.28	760	32	19	70	-	-	.060	.014	.018	.480	.021	2.030	50	3	47	-	-	-
Sept.19	8.15	770	17	15	60	-	-	.036	.025	.026	.740	.024	1.980	64	11	53	-	-	-

Table 14 d: Lake Wabukayne outlet samples - 1977

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus Tot.	Phosphorus DR	Nitrogen NH_3	Nitrogen TKN	Nitrogen NO_2	Nitrogen NO_3	TC	TOC	TIC	Chlorophyll a	Chlorophyll Acidified a	Secchi disc
1977																			
May 3	7.98	580	33	-	53	-	-	.072	.028	.002	.760	.003	2.760	38	13	25	-	-	-
10	8.35	700	6.1	-	-	-	-	.033	.001	<.002	.760	.033	2.670	37	5	32	-	-	-
17	8.26	620	10	15	57.5	-	-	.026	.005	.064	.840	.033	1,820	37	8	29	-	-	-
25	8.00	570	18	6.7	52.5	-	-	.030	.010	.114	.900	.039	1.890	36	9	27	-	-	-
31	8.06	570	6.4	2.0	55	-	-	.024	.004	.086	.750	.041	1.390	32	9	23	-	-	-
June 7	7.93	495	27	13.0	49.5	-	-	.034	.019	.084	.760	.043	1.310	30	17	13	-	-	-
14	8.13	540	5.2	4.2	56	-	-	.019	.002	.078	.640	.033	1.390	33	8	25	-	-	-
21	7.99	490	10	2.3	47.5	-	-	.023	.006	.116	.660	.036	1.160	32	9	23	-	-	-
28	7.94	385	26	7.1	33.0	-	-	.046	.020	.088	.600	.045	1.200	23	8	15	-	-	-
July 5	8.05	415	12	2.6	37	-	-	.019	.010	.094	.570	.048	1.150	28	9	19	-	-	-
8	8.01	320	180	76	25	-	-	.330	.135	.080	1.040	.095	1.480	26	7	19	-	-	-
12	7.98	380	27	2.9	29.5	-	-	.046	.024	.048	.640	.057	1.490	28	11	17	-	-	-
19	8.26	420	10	4.7	34	-	-	.027	.008	.040	.600	.049	1.500	26	8	18	-	-	-
26	8.11	470	10	4.4	41.5	-	-	.026	.011	.074	.680	.047	1.250	35	17	18	-	-	-
Aug. 3	7.73	365	53	12	28	-	-	.109	.052	.104	.800	.065	1.580	23	7	16	-	-	-
9	7.91	345	68	15	25	-	-	.130	.090	.144	.900	.082	1.220	24	7	17	-	-	-
16	7.91	360	24	4.9	25.5	-	-	.046	.019	.094	.780	.067	1.080	25	8	17	-	-	-
23	8.06	340	38	11	23.5	-	-	.060	.028	.072	.700	.064	1.190	24	7	17	-	-	-
31	8.12	365	4.0	2.0	25	-	-	.023	.003	.046	.650	.048	.952	29	11	18	-	-	-
Sept. 8	8.10	365	12	-	24.5	-	-	.019	.007	.056	.670	.039	.801	29	11	18	-	-	-
19	7.82	350	40	8.5	23	-	-	.086	.071	.126	.860	.054	.861	30	9	21	-	-	-
Oct. 4	7.54	320	120	32	25	-	-	.264	.135	.024	1.240	.047	1.580	36	12	24	-	-	-
21	7.37	440	29	5.9	30	-	-	.126	.068	.126	.960	.036	1.000	43	13	30	-	-	-

Table 15 a: Lake Wabukayne lake station samples collected as composites through the euphotic zone - 1978.

		pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				TC	TOC	TIC	Chlorophyll		Secchi disc
									Tot.	DR	NH_3	TKN	NO_2	NO_3				a	Acidified a	
1978																				
May	11	8.13	700	19	13	100			.053	.006	.016	.82	.031	.810	41.8	7.8	34.0	12	8.8	0.3
	18	8.15	640	23	21	81			.080	.017	.138	1.04	.033	.815				20.6	16.4	0.4
	25	8.57	645	8.5	15	80			.034	.001	.088	.80	.029	.635				8.3	4.2	0.7
June	1	8.12	680	2.4	2.4	88			.032	.006	.120	.78	.025	.465						
	8	8.51	700	7.5	12	98	140	78	.054	<.001	.008	.92	.028	.465	42.4	8.6	33.8	1.4	1.1	1.7
	14	8.31	640	18	20	92			.090	.005	.038	1.22	.033	.270				11.4	8.7	0.95
	22	8.64	620	8.3	10	95			.031	.001	.008	.77	.016	.040				34.4	26.4	0.3
	29	8.54	650	3.7	2.4	95			.028	<.001	.048	.82	.016	.120				7.1	5.5	0.7
																		0.9	0.5	2.6
July	6	8.44	630	2.2	1.9	-	93	72	.014	<.001	.026	.65	.014	.155	32.2	10.8	21.4			
	13	8.57	640	2.0	1.3	103			.018	<.001	.026	.64	.010	.090				0.7	0.7	2.8
	19	8.34	650	2.0	1.6	105			.021	.001	.040	.73	.007	.068				1.2	1.2	2.7
	27	7.95	660	5.6	3.6	105			.026	.001	.066	.80	.040	.190				0.9	0.8	bottom
																		1.6	1.2	2.4
Aug.	3	7.74	525	18	12	70	88	62	.039	.010	.088	.65	.036	.494	32.4	10.8	21.6			
	11	8.05	540	6.0	2.5	74			.026	.004	.060	.62	.033	.405				1.3	1.3	0.5
	17	8.38	500	4.8	4.4	78			.024	.002	.042	.55	.024	.246				1.1	0.8	2.4
	24	8.05	495	53	73	72			.019	.007	.076	.14	.020	.185				2.1	1.4	1.8
	31	7.30	455	18	17	56			.038	.016	.126	.82	.059	.349				5.3	-	0.9
																		6.7	4.5	0.4

Table 11b: Lake Wabukayne lake station samples collected from 1m above the bottom - 1978

Date		pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				TC	TOC	TIC	Fe	Na	K
									Tot.	DR	NH_3	TKN	NO_2	NO_3						
1978																				
May	11	8.14	700	18	12	100	-	-	.058	.005	.016	.85	.031	.810	41.8	7.8	34.0	-		
	18	7.97	630	32	21	81			.082	.022	.092	1.00	.037	.880						
	25	8.54	655	5.6	9.3	78			.046	.002	.074	.87	.027	.695						
June	1	8.19	680	2.2	2.0	91			.050	.007	.140	1.00	.025	.555						
	8	8.48	700	7.6	13	98	138	75	.056	<.001	.008	.94	.028	.470	42.2	8.6	33.6	.57		

Table 15 c: Lake Wabukayne main inlet samples - 1978

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				TC	TOC	TIC	Fe	Na	K
								Tot.	DR	NH_3	TKN	NO_2	NO_3						
1978																			
May 11	8.10	840	-	-	-			.053	.006	.016	.82	.031	.810	41.8	7.8	34.0			
18	8.08	780	8.3	12	79			.039	.005	.026	.72	.012	.575						
25	8.16	665	27	35	70			.088	.007	.078	1.02	.024	.590						
June 1	8.18	710	5.9	5.5	93			.041	.007	.098	.87	.024	.540						
8	8.53	700	7.4	12	99	141	74	.043	<.001	.009	.82	.027	.480	42.3	8.6	33.7	.44		
14	8.42	670	20	22	94			.058	.003	.014	.94	.038	.335						
22	8.52	640	8.7	8.8	98			.032	.002	.024	.78	.017	.155						
29	7.99	820	9.1	9.3	-			.038	.002	.006	.70	.013	.920						
July 6	7.90	880	7.1	-	125	170	-	-	-	-	-	-	-	47.2	6.4	40.8	.42		
13	8.52	680	2.2	1.8	105			.057	.020	.020	.74	.014	-						
19	8.06	770	6.8	12	105			.094	.030	.056	.86	.026	1.07						
27	7.99	700	12	9.0	93			.026	.001	.030	.72	.020	.730						
Aug. 3	7.91	870	6.8	12	163	175	143	.045	.007	.052	.69	.034	.721	50.6	7.8	42.8	.60		
11	8.47	660	6.3	6.5	95			.036	.003	.002	.58	.024	.470						
17	8.11	590	4.4	18	85			.055	.004	.098	.90	.029	.371						
24	8.24	270	145	261	30.5			3.42	.205	.044	3.20	.074	1.51						
31	8.15	395	360	1367	45.5			.820	.062	.038	1.16	.018	.260						
Oct. 25	7.90	800		13	93	158	112	.048	.004	.030	.60	.049	.785	44.2	6.2	38.0	.60		

Table 15 d: Lake Wabukayne outlet samples - 1978

Date		pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				TC	TOC	TIC	Fe	Na	K
									Tot.	DR	NH_3	TKN	NO_2	NO_3						
1978																				
May	11	8.14	700	-	-	-			.057	.006	.014	.90	.031	.810	41.7	7.7	34.0			
	18	8.16	640	21	19	81			.074	.010	.114	1.80	.031	.830						
	25	8.57	625	7.7	11	75			.036	.002	.086	.79	.028	.595						
June	1	8.23	690	3.7	4.3	89			.029	.005	.112	.77	.025	.520						
	8	8.58	700	6.2	6.2	100	144	75	.035	.001	.012	.79	.026	.440	43.5	8.5	35.0	.19		
	14	8.37	640	18	18	92			.068	.003	.024	1.08	.033	.285						
	22	8.67	620	7.6	8.7	93			.042	.001	.020	.92	.015	.025						
	29																			
July	6																			
	13																			
	19																			
	27	8.09	660	2.8	1.1	103			.022	.001	.056	.75	.038	.192						
Aug	3	7.64	495	21	12	68	84	58	.036	.010	.100	.69	.037	.583	31.2	10.4	20.8	1.35		
	11	8.09	540	4.1	1.0	77			.018	.002	.044	.58	.029	.380						
	17	8.44	550	2.5	2.4	80			.018	.004	.054	.56	.023	.247						
	24	8.47	520	4.9	6.8	71			.039	.003	.034	.54	.019	.145						
	31	8.21	440	22	12	54			.100	.013	.074	.62	.081	.250						
Oct.	25	7.85	490	8.1	7.8	44.0	118	69	.052	.002	.134	.52	.077	.710	35.7	6.7	29.0	.37		

Table 16 a: Lake Wabukayne lake station samples collected as composites through the euphotic zone - 1979

	pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				TC	TOC	TIC	Chlorophyll		Secchi disc
								Tot.	DR	NH_3	TKN	NO_2	NO_3				a	Acidified a	
1979																			
May 15	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	30.0	25.0	0.3
22	7.91	740	7.8	12	98			.061	.001	.010	1.10	.031	.614				36.5	31.5	0.8
31	8.24	590	17	14	75			.065	<.001	.013	.98	.036	.714				21.5	18.8	0.5
June 7	8.03	710	9.0	6.0	93			.060	.006	.050	.98	.035	.525				7.7	6.1	0.6
14	8.06	530	85	28.0	65	117	48.5	.205	.069	.016	1.45	.084	1.24	35.3	8.5	26.8	25.8	23.2	.11
21	7.37	550	16	10	76	56	56.0	.073	.003	.029	1.00	.068	.577	30.3	8.1	22.2	36.5	30.0	0.6
28	7.93	640	17	19	88			.093	.002	.036	1.18	.059	.346				38.0	24.0	0.3
July 5	7.73	630	14	19	78			.108	.004	.012	1.80	.048	.527				34	14	.55
10	7.92	640	3.6	10	82.5			.065	.002	.027	1.05	.034	.256				50	47	1.1
19	8.42	540	3.1	5.0	68			.031	.006	.012	.63	.028	.517				15.4	13.9	1.3
26	8.08	640	4.2	3	74	146	69	.024	.007	.031	.54	.017	.273				6.3	5.4	1.5
31	7.56	650	2.5	2	75	146	66	.017	.003	.123	.70	.018	.297						2.8
Aug. 8	7.51	550	13	4	55			.063	.015	.315	1.00	.047	.418				2.2	1.0	1.1
16	7.61	600	6.8	6	61	155	57	.025	.011	.420	.88	.037	.283	44.4	6.4	38.0	1.8	1.4	1.9
Sept.20	7.86	455	17	13	42.5	121	46.5	.060	.010	.080	.60	.030	.419	33.2	4.6	28.6	9.5	5.0	0.5

Table 16 b: Lake Wabukayne lake station samples collected from 1m above the bottom - 1979.

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus Tot.	Phosphorus DR	Nitrogen NH_3	Nitrogen TKN	Nitrogen NO_2	Nitrogen NO_3	TC	TOC	TIC	Fe	Na	K
1979																			
May 15																			
22	7.71	800	7.2	12	113			.070	.003	.056	1.20	.033	.652						
31	7.71	710	20	9	91			.080	.009	.049	.95	.032	.773						
June 7	7.91	770	7.5	10	100			.063	.001	.038	1.00	.031	.429						
14	7.55	570	8.4	16	70	129	53	.178	.078	.133	1.33	.083	1.17	38.2	8.4	29.8	3.6	38	7.0
21	7.72	660	18	15	80	151	59	.155	.005	.082	1.72	.073	.842	44.5	7.7	36.8	.58	43	-
28	7.42	660	28	35	85			.118	.004	.091	1.38	.057	.608						
July 15	7.42	660	12	19	80			.095	.003	.015	.65	.065	.430						
10	7.95	630	3.8	12	83.5			.079	.002	.010	1.15	.040	.240					44	5.45
19	7.40	540	3.9	6	69			.038	.004	.014	.63	.027	.468					34	4.95
26	8.10	640	4.5	4	74	147	69	.024	.001	.034	.52	.018	.287					38	5.75
31	7.46	670	3.0	2	77	154	66	.021	.006	.181	.80	.018	.272					38	6.00
Aug. 8	7.52	550	13	2	55			.043	.012	.289	.88	.044	.421					28	5.45
16	7.64	600	7.6	5	61	155	56	.023	.009	.410	.90	.037	.288	44.6	6.4	38.2	.62	33	4.85
Sept. 20	7.85	455	17	12	42.5	-	46.0	.060	.011	.088	.68	.030	.429	33.2	4.5	28.8	.86	21	-

Table 16 c: Lake Wabukayne main inlet sample - 1979

Date		pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				TC	TOC	TIC	Fe	Na	K
									Tot.	DR	NH_3	TKN	NO_2	NO_3						
1979																				
May	15	7.91	780	32	27	88			.275	.160	.218	1.88	.044	.931						
	22	8.09	750	5.8	15	105			.055	.001	.005	1.10	.028	.547						
	31	8.39	670	14	16	91			.060	.001	.005		.038	.742						
June	7	8.04	720	13	21	93			.090	.001	.070	1.13	.031	.551						
	14	8.04	1250	84	50	213	218	115	.165	.031	.041	.98	.065	1.68	62.4	4.8	57.6	4.1	90	9.8
	21	8.20	780	12	13	110	133	88	.072	.004	.040	.925	.060	1.19	38.7	6.9	31.8	.51	58	
	28	7.99	640	16	18	88			.070	.002	.027	.90	.058	.537						
July	5	8.02	870	13	12	125			.043	.003	.002	.63	.004	.771						
	10	7.54	860	6.5	13	89.5			.163	.020	.373	1.63	.067	1.75						
	19	8.30	620	39	9	78			.038	.001	.024	.75	.026	.639					48	5.85
	26	8.12	630	4.2	4	76	137	69	.021	.002	.018	.50	.020	.415					38	5.55
	31	7.49	670	8.6	12	75	154	69	.153	.058	.144	1.25	.090	.960					38	6.15
																			36	6.6
Aug.	8	7.73	710	13	7	90			.058	.013	.134	.88	.042	.873					42	6.9
	16	7.94	600	7.5	8	62	155	58	.020	.006	.336	.80	.036	.294	43.7	6.3	37.4	.52	32	4.90
Sept.	20	8.02	1100	7.8	6	143	222	-	.050	.018	.058	.58	.025	1.015	50.7	3.7	47.0	.55	73	-

Table 16 d: Lake Wabukayno outlet samples - 1979

Date		pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				TC	TOC	TIC	Fe	Na	K
									Tot.	DR	NH_3	TKN	NO_2	NO_3						
1979																				
May	15	7.96	650	25	36	93			.085	.003	.054	1.00	.048	1.15						
	22	8.35	730	5.6	9	100			.043	.001	.006	1.00	.029	.566						
	31	8.45	580	17	14	73			.058	.001	.001	.88	.036	.689						
June	7	8.26	690	11	7	88			.035	.001	.020	.75	.031	.539						
	14	8.03	530	86	24	65	116	49.4	.205	.078	.053	1.38	.092	1.26	34.8	8.4	26.4	4.0	36	6.5
	21	8.55	530	14	9	75	89	56	.055	.003	.028	.975	.065	.550	28.0	7.6	20.4	.35	41	-
	28	8.05	640	16	16	88			.085	.002	.018	1.03	.057							
July	5	8.05	610	12	14	75			.070	.004	.014	.20	.050	.545						
	10	8.38	630	3.8	7	82.5			.113	.001	.006	1.25	.035	.325					44	5.85
	19	8.47	540	2.9	5	65			.021	.001	.011	.50	.029	.566					33	5.0
	26	7.98	600	3.6	4	71	130	64	.024	.007	.026	.49	.019	.311					38	6.15
	31	7.84	650	1.6	2	75	144	69	.024	.002	.110	.75	.018	.302					37	6.05
Aug.	8	7.59	540	13	3	55			.038	.010	.273	.88	.044	.416					28	5.50
	16	7.73	600	7.2	2	62	154	57	.063	.008	.420	.93	.037	.293	44.1	6.3	37.7	.54	32	4.90
Sept.	20	7.91	455	17	12	42.5	121	46.5	.050	.008	.010	.63	.030	.429	33.4	4.6	28.8	.84	22	-

able 17 a: Lake Wabukayne lake station samples collected as composites through the euphotic zone - 1980.

	pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				TC	TOC	TIC	Chlorophyll		Secchi disc
								TP	FRP	NH_3	TKN	NO_2	NO_3				a	Acidified a	
1980																			
May 29	8.19	600	-	7	81.5	111	70	.060	.003	.146	.88	.056	.424	34.0	7.0	27	16	-	1.1
June 5	7.98	550	-	-	-	112	-	.033	.007	.170	.77	.050	.588	34.4	6.6	27.8	0.7	-	2.1
12	8.13	550	8.6	10	72.5	107	-	.048	.002	.006	.68	.055	.590	32.7	7.1	25.6	-	-	0.8
26	8.85	500	2.7	3	73.5	95	53.5	.032	.003	.054	.65	.046	.521	30.8	6.8	24	1.1	-	2.5
July 4	7.85	455	5.3	3	57.0	82	48.0	.035	.012	.196	.68	.043	.677	26.7	6.3	20.4	2.0	-	2.0
10	7.81	450	13.0	12	52.0	104	48.0	.035	.009	.164	.75	.040	.555	-	-	-	1.5	-	1.8
24	7.72	365	-	6	35.5	80	38.5	.058	.022	.286	.93	.083	.678	26.5	7.1	19.4	1.6	-	1.5
Aug. 7	8.26	405	10	8	33.5	100	51.0	.102	.021	.079	.98	.125	1.13	30.6	6.6	24.0	19.6	-	0.85
14	8.25	425	7.8	7	41.0	96	49.0	.028	.003	.094	.82	.076	.097	31.5	8.3	23.2	5.9	-	1.0
Sept.30	7.89	365	-	17	33.0	87	40.0	.078	.008	.132	.81	.074	.676	-	-	-	13	-	0.4
Oct. 22	7.76	365	42	14	33.5	84	45.0	.152	.072	.282	.95	.056	.724	36.2	4.6	21.6	8.7	-	0.3
Nov. 5	7.92	440	33	12	38.5	99	58.0	.225	E	.312	.95	.072	1.03	29.2	4.6	24.6	8.7	-	0.4

Table 17 b:

Lake Wabukayne lake station samples collected from 1m above bottom - 1980

	pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				Carbon			Fe	Na	K
								TP	FRP	NH_3	TKN	NO_2	NO_3	TC	TOC	TIC			
1980																			
May 29	8.17	600	-	8	81.5	112	67	.044	.002	.150	.84	.055	.430	34.0	6.6	27.4	.16	50	-
June 5	7.87	550	-	-	-	110	-	.028	.010	.194	.76	.050	.578	34.3	6.5	27.8	.23	-	-
12	8.08	550	8.5	10	70.0	107	-	.052	.002	.012	.72	.055	.595	32.7	7.1	25.6	.52	40	5.0
26	8.56	500	2	2	71.5	95	52.5	.018	.001	.070	.60	.048	.552	30.8	6.8	24.0	.06	35	4.75
July 4	7.81	435	13	4	51.5	83	47	.065	.036	.314	.85	.047	.667	26.4	6.0	20.4	-	30	-
10	7.60	425	9.3	4	50.5	79	44	.025	.009	.224	.78	.042	.603	26.0	6.2	19.8	.60	27	5.2
24	7.68	350	-	6	33.0	79	37	.048	.015	.280	.93	.135	.597	25.8	6.8	19.0	.80	19	4.75
Aug. 7	7.82	415	15	11	33.5	102	48.5	.160	.070	.131	1.03	.125	1.22	32.0	6.8	25.2	.90	18	6.0
14	8.11	405	8.7	7	38.5	92	46.5	.038	.004	.120	.85	.076	.092	30.9	8.3	22.6	.02	21	5.5
Sept.30	7.85	365	-	20	33.0	87	40.0	.080	.010	.154	.84	.075	.675	-	-	-	1.2	17	5.15
Oct. 22	7.77	375	47	17	34.0	85	46.0	.160	.071	.256	.88	.053	.727	26.4	4.6	21.8	3.0	18	6.0
Nov. 5	7.96	445	35	15	39.0	99	59.0	.220	.170	.288	.88	.075	1.02	29.6	4.8	24.8	2.0	19	7.2

Table 17 c: Lake Wabukayne north inlet samples - 1980

	pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus TP	Phosphorus FRP	Nitrogen NH_3	Nitrogen TKN	Nitrogen NO_2	Nitrogen NO_3	Carbon TC	Carbon TOC	Carbon TIC	Fe	Na	K
1980																			
May 29	8.13	700	3.2	9	-	123	85	.050	.005	.128	.94	.065	.620	36.6	6.6	30	.30	59	-
June 5	7.95	700	-	-	-	128	-	.101	.032	.250	1.09	.063	1.03	38.1	6.3	31.8	.70	-	-
12	8.22	600	270.	37	76.5	154	62.5	.575	.140	.002	1.45	.002	.842	36.4	4.8	31.6	18	46	13
26	8.28	600	2.7	3	86.0	111	64	.040	.001	<.002	.70	.057	.743	34.6	6.4	28.2	.11	43	6.5
July 14	7.91	650	8.5	14	92	102	13.5	.082	.037	.154	.82	.059	1.04	31.6	6.0	25.6	-	48	-
10	7.96	475	8.3	6	58.5	89	54	.020	.003	.110	.60	.039	.671	27.6	5.6	22.0	.49	31	5.7
24	7.80	400	13.0	11	39.5	87	42	.055	.005	.158	.85	.064	.799	27.6	6.8	20.8	.92	23	5.2
Aug. 7	8.18	600	17.0	16	64.0	112	76.5	.075	.026	.086	.76	.091	1.31	33.3	6.3	27.0	1.00	32	8.0
14	8.12	230	320.	389	16.5	87	40.5	.450	.130	.258	1.40	.130	1.12	23.4	9.7	13.6	.05	7.7	9.5
Sept.30	7.98	1100	34.	31	176	167	134.5	.210	.160	.390	1.04	.28	1.27	44.0	3.5	40.5	2.0	85	9.8
Oct. 22	8.01	860	140.	123	117	131	142	.425	.210[1]	2.24[1]	13.0	.270	1.18	32.0	3.8	28.2	8.1	53	9.1
Nov. 5	8.07	1280	27.	33	205	201	152	.162	.095	.046	.78	.095	2.70	56.2	5.7	50.5	1.7	91	7.9
25	7.62	1360	96.	111	323	101	65.0	.275	.089	.026	1.05	.084	1.47	33.0	8.2	24.8	5.8	195	7.15

[1]values not used in calculation of mean

Table 17 d:
Lake Wabukayne south inlet samples - 1980.

		pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				Carbon			Fe	Na	K
									TP	FRP	NH_3	TKN	NO_2	NO_3	TC	TOC	TIC			
1980																				
June	5	7.48	750	-	-	-	-	-	.884	.374	.210	1.92	.270	1.83	-	-	-	.42	-	-
	12	7.94	1000	1.8	4	23.9	97	52.5	.114	.036	.550	1.47	.050	.730	29.4	6.4	23.0	.14	130	4.40
	26	8.28	600	3.4	3	86.0	111	64	.045	.001	<.002	.72	.056	.744	34.6	6.4	28.2	.13	43	6.6
July	4	8.27	500	97	78	51.5	117	65	.148	.033	.198	1.62	.039	.636	29.5	2.3	27.2	-	34	-
	10	7.92	500	7.5	8	65.0	90	54.5	.028	.009	.112	.68	.055	.725	28.0	5.6	22.4	.49	34	6.1
	24	7.78	400	13.0	10	39.5	87	42.5	.045	.003	.170	.88	.064	.814	27.8	6.8	21.0	.86	26	5.25
Aug.	7	8.23	550	15	14	51.5	113	76.5	.102	.050	.150	.83	.145	1.30	33.4	6.2	27.2	.94	31	9.0
	14	8.10	155	72	98	13.0	38	18.5	.170	.043	.48	1.20	.060	.099	18.0	9.6	7.4	.125	5.7	2.45
Sept.	30	7.78	410	52	52	38.0	100	47.	.135	.030	.114	.72	.044	.616	28.0	3.2	24.8	3.6	19	6.3
Oct.	22	8.02	780	110	110	71.0	173	118.	.235	.025	.064	1.20	.067	3.18	47.5	3.5	44.0	6.7	30	15.7
Nov.	5	7.80	460	250	271	36.5	130	61.	.380	.059	.190	1.00	.051	1.65	33.0	3.6	29.4	16.0	18	12.5
	25	8.17	370	75	137	33.5	106	38	.160	.021	.010	.45	.008	.512	27.6	2.4	25.2	4.3	18	4.45

Table 17 e:

Lake Wabukayne outlet samples - 1980.

	pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				Carbon			Fe	Na	K
								TP	FRP	NH_3	TKN	NO_2	NO_3	TC	TOC	TIC			
1980																			
May 29	8.32	600	2.8	6	-	105	66	.033	.001	.108	.81	.057	.413	31.8	6.8	25	.11	49	-
June 5	8.00	-	-	-	-	112	-	.039	.006	.160	.84	.050	.593	34.4	6.6	27.8	.26	-	-
12	8.20	550	7.8	8	70.5	106	61.5	.035	.002	.002	.58	.055	.600	32.4	7.0	25.4	.56	40	5.0
26	8.42	500	2.6	3	71.5	94	53.5	.015	.001	.036	.58	.044	.581	30.8	6.8	24.0	.10	34	4.6
July 4	8.06	450	4.6	2	57.0	80	48.5	.040	.008	.130	.70	.041	.659	26.1	6.5	19.6	-	31	-
10	8.08	465	6.7	6	58.5	86	51	.018	.002	.112	.62	.037	.608	26.8	6.0	20.8	.44	30	5.6
24	7.72	365	8.8	5	36.0	80	39.5	.073	.081	.210	.90	.081	.709	25.9	6.9	19.0	.66	21	4.8
Aug. 7	8.71	395	7.2	9	33.5	95	47.5	.102	.013	.044	.98	.080	1.02	29.3	6.5	22.8	.64	18	5.8
14	8.31	430	6.6	6	42.0	97	51.0	.022	.002	.066	.80	.075	.097	31.7	8.3	23.4	.02	24	6.0
Sept.30	7.78	360	14	10	33.0	86	40.0	.078	.011	.128	.78	.074	.676	25.4	4.4	21.0	1.0	17	5.05
Oct. 22	7.74	365	42	18	33.0	84	46.0	.172	.070	.286	1.00	.054	.726	26.3	4.7	21.6	2.7	17	5.9
Nov. 5	7.79	440	31	14	38.0	98	57.0	.225	E	.334	1.02	.071	1.03	29.3	4.7	24.6	1.6	19	7.1

Table 18 a: Lake Wabukayne lake station samples taken as composites through the euphotic zone - 1981

	pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				TC	TOC	TIC	Chlorophyll			Secchi disc
								TP	FRP	NH_3	TKN	NO_2	NO_3				a	b	Acidified a	
Apr. 3	7.92	1300	26	62	306	116	87	.099	.001	.318	1.56	.082	1.22	-	4.4	27	-	-	-	-
May 7	8.09	800	38	19	145	106	76	.095	.031	.308	.86	.06	1.09	-	5.5	27.6	-	-	-	0.4
20	8.17	630	7.5	21	106	90	74	.07	.015	.14	.75	.05	1.05	-	4	21.8	30	<.1	28	0.5
June 18	7.81	600	1.0	7	97	77	75	.08	.033	.364	.93	.007	1.09	-	6.4	21.4	19	5.2	13	0.8
Jly 6	7.66	520	16	30	70	86	56	.168	.072	.01	1.25	.005	1.7	-	5.8	38	38	[1]19	31	0.25
15	7.98	640	29	22	80	123	77	.09	.026	.006	.88	.018	1.33	-	4.7	29.6	19	4.5	15	0.4
23	7.79	520	4	19	48.5	115	71	.059	.019	.006	.4	.006	1.14	-	3.7	27.8	4.5	.8	3.3	0.5
31	7.84	-	146	-	34.5	84	48	.2	.095	-	.58	.032	1.67	-	4.1	19.8	1.4	.3	1.2	0.15
Aug. 7	7.80	470	49	38.7	33.5	84	66	.2	.084	.012	.9	.02	2.48	-	4.9	20.2	15	2	15	0.2
13	8.69	460	37	-	42.5	110	63	.242	.185	.008	.7	.078	1.72	-	4.9	25	9.9	1.2	8.7	0.15
20	7.31	580	2.5	23.2	53.5	127	81	.21	-	<.002	2.65	<.001	3.15	-	7.4	32	34	1.3	25	0.3
Oct. 8	7.69	460	167	-	-	104	-	.375	.225	.022	.9	.033	2.07	-	6.6	24.4	4.5	1.2	3.6	0.05
Nov. 2	7.68	670	55	27.4	54	159	118	.170	.064	.02	.78	.04	2.06	-	5.4	34	4.9	1.1	4.9	0.15

[1] value not used in calculation of mean.

Table 18 b:

Lake Wabukayne lake station samples collected from 1m above the bottom - 1981

		pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				Carbon			Fe	Na	K
									TP	FRP	NH_3	TKN	NO_2	NO_3	TC	TOC	TIC			
Apr.	13	8.08	1300	18	35	296	114	0	.09	.004	.33	1.44	-	-	-	4.4	28.6	.75	144	7.2
May	7	8.01	820	23	17	144	108	75	.104	.025	.248	.97	.06	-	-	5.5	28.2	.79	77	6.7
	20	7.97	660	8	20	104	100	74	.128	.023	.288	1.15	.07	1.03	-	4.0	25.2	.42	54	6.3
June	18	7.43	660	4.8	12	97	101	75	.115	.035	.004	1.48	.009	1.54	-	6.8	29.2	.66	51	9.1
July	6	7.52	560	27	46	76	110	61	.17	.049	.39	1.28	.065	.745	-	7.1	26.2	3.15	38	7.7
	15	7.67	620	65	43	79	131	75	.10	.028	.006	.82	.006	1.34	-	4.1	31.6	2.75	39	10.5
	23	7.66	520	25	19	48.5	119	64	.07	.016	.004	.3	.004	1.3	-	3.5	29.8	1.2	27	7.2
	31	7.76	380	176	-	34	83	47	.21	.097	-	.48	.035	1.62	-	4.2	19.4	7.5	18	7.9
Aug.	7	7.81	470	22	48.1	33.5	98	63	.302	.164	.018	.82	.054	2.25	-	4.5	22.8	11.25	20	11.5
	13	7.65	490	35	-	48.5	108	70	.405	.35	.01	.65	.01	1.84	-	5.2	25.8	2.45	28	6.1
	20	7.37	650	12.8	23.4	68	126	85	.125	.053	.004	1.55	.002	2.3	-	6.4	37	1.45	3.5	6.9
Oct.	8	7.66	460	167	-	43.5	107	63	.340	.185	.024	1.25	-	2.0	-	6.8	24	10.0	-	-
Nov.	2	7.74	660	48	28.0	61.0	154	113	.155	.068	.014	.72	.038	2.08	-	5.4	34	2.90	33	8.6

Table 18 c:
Lake Wabukayne samples from the north inlet - 1981

	pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				Carbon			Fe	Na	K
								TP	FRP	NH_3	TKN	NO_2	NO_3	TC	TOC	TIC			
Mar. 25	7.59	3600	2.8	6	950	193	181	2.05	1.9	.25	10.4	[1]4.95	6.3	-	17.7	42	.15	498	12.5
Apr. 13	8.08	3000	4.	12	760	237	193	1.97	1.85	1.87	7.47	.035	9.47	-	4	-	.2	368	11.7
May 7	7.17	2000	6.3	4	403	201	168	1.22	2.25	.43	5.02	.01	9.99	-	3.5	54	.07	214	11.6
20	7.67	2150	2	6	450	221	199	.263	.28	.126	.67	.33	3.77	-	1.9	57	.05	219	11.4
June 18	7.55	1750	2.2	5	301	212	210	.325	.05	.002	1.28	.006	1.0	-	2.9	58	.2	160	14
July 6	7.47	1000	10	38	141	169	100	.268	.15	.014	1.2	.006	2.54	-	3.7	41	1.7	75	14
15	7.56	1300	[1]91	104	210	213	171	.212	.09	.01	.55	.016	2.58	-	2.7	53	4.55	101	12.9
23	7.59	1550	0.5	3	242	239	234	.089	.076	.028	.35	.065	2.69	-	2.1	60.6	.01	120	14
31	7.74	1500	.98	-	-	225	-	.171	-	.006	.35	.002	4.2	-	2.6	54	.07	122	14.6
Aug. 4	8.37	[1]146	[1]600	[1]646	[1]13	-	[1]43	4.34	.075	.014	5.35	.037	1.16	-	8.4	[1]19.2	[1]225	[1]5.9	13.1
7	7.71	1750	1.12	6.4	217	238	208	.179	.09	.004	.45	.086	4.26	-	2.6	56	.03	111	13.3
13	7.7	1460	1.0	-	219	235	205	.40	.30	.004	.84	.003	5.8	-	3.8	55.6	.09	120	12.4
Oct. 8	7.73	1550	.52	<.1	147	123	150	.115	.087	.01	.4	.001	4.2	-	2.6	61	.05	-	-
9	7.80	1070	1.87	-	-	216	-	.059	.051	.004	.38	.051	2.35	-	2.7	52.6			
Nov. 2	7.62	1280	1.86	1.7	166	266	200	.155	.625	.004	.91	.19	4.26	-	2.7	66	.05	86	11.4

[1]Value not used in calculation of mean.

Table 18 d: Lake Wabukayne samples from the south inlet - 1981

	pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				Carbon			Fe	Na	K
								TP	FRP	NH_3	TKN	NO_2	NO_3	TC	TOC	TIC			
Mar. 25	7.99	760	88.	76	121	180	91	.152	.022	.14	.65	.054	1.8	-	2.5	29	5.3	58	12.3
Apr. 13	8.18	650	5.7	4	68	152	77	.019	.009	.016	.98	-	-	-	2.1	40	.31	32	5.3
May 7	8.30	540	15	33	66	110	70	.039	.002	.054	.22	.018	1.18	-	2.3	28.2	1.05	32	8.8
20	7.99	640	63	85	82	128	83	.145	.01	.01	.45	.009	1.79	-	-	-	4.4	38	8.5
June 18	8.04	620	5.5	10	77	202	185	.075	.034	.002	.68	.005	4.75	-	5.2	54	.82	75	22
July 6	7.94	880	15	31	105	170	107	.085	.032	.006	.52	.009	2.79	-	2.9	41.6	1.7	58	19
15	7.24	445	290	282	38.5	112	9	.325	.039	.01	.5	.016	1.03	-	2.2	26.8	13.5	19	8.5
23	8.08	620	122	182	50	151	87	.195	.036	.006	.5	.012	1.59	-	2.7	33.8	6.1	29	10.3
31	7.86	660	186	-	-	116	-	.258	.024	.01	.6	.012	1.99	-	2.4	34.6	13.1	35	11.8
Aug. 4	7.18	-	590	[1]1676	11.5	-	-	[1]11.4	.028	.034	[1]10.6	.075	.785	-	[1]15	69	[1]570	6.1	4.4
7	7.96	900	92	389	63	235	112	.292	.027	.004	.48	.014	2.79	-	5.9	51	12.75	34	12.5
13	7.75	760	99	-	70	264	109	.95	.26	.012	1.1	.03	1.82	-	5.1	52	43	34	7.5
20	8.15	880	6.8	54.8	-	245	123	.042	.017	.006	.4	.002	2.5	-	1.8	54	1.0	41.5	8.8
Oct. 8	7.80	790	15.2	-	78	184	122	.045	.018	.046	.58	.025	2.82	-	4.0	37	1.4	-	-
Nov. 2	7.91	1040	470	473	96	293	215	.465	-	-	1.05	-	-	-	4.5	34	20.0	59	10.5

[1]Value not used in calculations of mean.

Table 18 e: Lake Wabukayne samples from inlet #2 - 1981

	pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				Carbon			Fe	Na	K
								TP	FRP	NH_3	TKN	NO_2	NO_3	TC	TOC	TIC			
Mar. 25	7.65	1060	8.4	15	196	219	68	.099	.04	.132	.65	.071	1.68	-	3.2	40	.47	101	5.95
Apr. 13	8.46	650	2.5	2	86	137	48.5	.076	-	.074	.65	.55	.80	-	2.2	33.6	.09	36	5.4
May 7	7.91	1040	5	28	173	194	65	.115	-	.06	-	.009	2.4	-	2.9	50	1.02	76	5.9
20	8.01	960	0.8	3	39	190	63	.035	.028	.036	.38	.023	2.13	-	2	54	.01	59	5.65
June 18	8.15	850	.65	<1	124	181	60	.04	-	<.002	.31	.001	2.2	-	2.5	49	.04	48	5.9
July 6	7.85	760	1.3	5	98	173	50	.128	.105	.004	.68	.05	2.15	-	4.5	43	.11	36	7.2
15	7.68	800	1.0	9	108	182	29	.128	.09	.01	.82	.074	-	-	5.1	45	.25	40	7
23	7.73	800	[1]107	107	111	195	71	.165	.041	.008	.55	.004	2.2	-	2.7	48	4.35	42	7
31	7.99	920	1.36	-	-	201	-	.046	.031	.06	.32	.001	3.45	-	2.7	47	.18	45	8
Aug. 4	7.88	210	[1]260	309	11.5	82	36	[1]2.55	.34	.016	[1]3.8	.046	2.05	-	10.5	16.2	[1]92	[1]5.8	8.7
7	7.68	1020	2.8	11.5	108	203	82	.099	.065	.014	.53	.01	3.09	-	4.3	47.6	.09	42	7.1
13	7.99	900	1.6	-	116	226	91	.32	.27	.016	.52	.003	3.3	-	3.8	50.6	.09	47	7.1
20	7.96	820	1.11	3.8	102	221	77	.046	.031	.004	.35	.001	2.7	-	2.5	47.6	.14	42	5.95
Oct. 8	8.21	760	3.6	-	92	206	-	.045	.023	.004	.42	.004	2.15	-	3.3	35	.29	34	6.2
Nov. 2	8.02	980	.38	0.3	132	254	82	.036	.028	.020	.23	.007	3.04	-	1.9	55	.03	42	6.2

[1]Value not used in calculations of mean

Table 18 f:
Lake Wabukayne samples from the inlet below the sedimentation basin - 1981

	pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				Carbon			Fe	Na	K
								TP	FRP	NH_3	TKN	NO_2	NO_3	TC	TOC	TIC			
Mar. 25	7.85	1900	1.9	6	477	115	79	.187	.15	.268	1.02	.55	1.5	-	3.4	29	.27	264	5.1
May 7	7.91	1040	5	28	173	194	65	.115	-	.06	.69	.009	2.4	-	2.9	50	1.02	76	5.9
July 15	8.37	640	25	15	82	119	76	.062	.016	.022	.62	.052	1.04	-	5	27.8	1.04	41	10.1
23	7.77	500	23	23	48.5	118	69	.065	.022	.008	.52	.004	1.25	-	3.3	28.6	1.14	26	7.2
31	8.29	385	.98	-	34.5	82	-	.212	.095	-	.58	.027	1.72	-	3.6	18.2	6.	18	7.3
Aug. 7	7.71	1750	1.12	-	217	238	208	.179	.09	.004	.45	.086	4.26	-	-	-	.03	111	13.3
13	7.74	440	13.1	-	42	93	64	.28	.28	.01	.92	.01	1.99	-	4.9	22.4	1.65	24	5.25
20	8.61	560	5.8	11.2	53.5	123	81	.07	.026	.004	1.0	.001	1.45	-	6.9	28	.68	30.5	6.35
Oct. 9	7.68	470	-	-	45	107	68.5	-	.175	.024	-	.042	2.06	-	6.6	24.6	9.0	-	-
Nov. 2	7.70	760	53	36.9	71	178	115	.142	.056	.004	.78	.068	2.33	-	4.7	33.8	2.85	37	8.7

Table 18 g:
Lake Wabukayne outlet samples - 1981

	pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				Carbon			Fe	Na	K
								TP	FRP	NH_3	TKN	NO_2	NO_3	TC	TOC	TIC			
Mar. 25	8.25	1300	6.4	11	288	119	[illegible]	.138	.039	.306	1.22	.058	2.04	-	4.3	28.8	.3	140	6.2
Apr. 13	7.65	1300	16	46	-	105	-	.106	-	.326	1.58	.094	1.26	-	4.6	27.8	.68	145	7.4
May 7	8.26	800	85	15	143	105	75	.078	.027	.164	.69	.07	1.13	-	5.5	27	.65	77	6.8
20	8.33	650	9	18	105	92	73	.07	.013	.166	.65	.048	1.05	-	4.	22.6	.53	54	6.3
June 18	8.39	580	4.5	7	96	70	75	.07	.021	.004	.75	.32	.56	-	6.2	18.2	.38	50	8.7
July 6	8.09	500	23	27	69	88	56	.17	.046	.38	1.28	.465	.635	-	6.2	19.6	1.8	35	7.1
15	8.0	650	30	31	81	123	77	.088	.039	.006	.80	.006	1.29	-	4.7	29.2	1.38	40	10.3
23	7.96	520	[1]610	16	48.5	115	71	.054	.014	<.002	.41	.059	1.04	-	3.6	27.8	.9	25	7.4
31	7.72	390	147	-	35	83	-	.215	.098	-	.55	.036	1.71	-	3.7	18.4	6.5	19	8.2
Aug. 4	7.78	310	83	130	27.5	88	49	1.15	.062	.01	1.9	.018	1.48	-	4.7	18.6	[1]47	14	5.6
7	7.82	470	110	28.3	33.5	82	60	.192	.098	.024	.85	.02	2.53	-	5.0	19.8	4.35	19	7.5
13	8.04	440	13.7	-	42	92	61	.088	.044	.012	.70	.08	1.72	-	4.8	21.6	1.4	24	5.25
20	7.36	560	2.1	16.8	53.5	143	84	.262	.160	<.002	3.45	.005	3.04	-	7.3	32.8	.84	30.5	6.3
Oct. 8	7.69	455	171	-	42	103	65	.34	.175	.03	1.15	.052	1.95	-	6.8	23.6	9.75	-	-
Nov. 2	7.72	660	49	-	61	158	113	.158	.070	.008	.80	.044	2.06	-	-	-	2.7	31	8.1

[1]Value not used in calculation of mean

Table 19 a: Lake Wabukayne lake station samples collected as composites through the euphotic zone - 1982

1982	pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				TC	TOC	TIC	Chlorophyll			Secchi disc
								TP	FRP	NH_3	TKN	NO_2	NO_3				a	b	Acidified a	
June 8	7.69	564	63	37.7	70	96.5	76	.235	.083	.008	1.28	.07	3.58	-	6.5	23.6	19.2	7.1	10.4	0.15
July 6	7.76	660	25	1.40	78	134.1	78	.113	.071	.034	1.05	.009	3.09	-	-	-	-	-	-	0.6
19	7.55	775	11.4	18.2	101	161.2	24.1	.040	.028	.086	.58	.007	1.54	-	7.5	37.6	13.6	1.0	10.6	0.85
Sept.14	8.17	676	12.2	10.9	76	151.4	87.6	.050	.0075	.138	.85	.055	.945	-	2.7	35.6	14.6	2.8	12.8	0.9

Table 19 b: Lake Wabukayne lake station samples collected from 1 m above the bottom - 1982.

1982	pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				Carbon			Fe	Na	K
								TP	FRP	NH_3	TKN	NO_2	NO_3	TC	TOC	TIC			
June 8	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
July 6	7.50	787	32.0	20.2	98	164	93.5	.105	.061	.040	1.05	.082	2.97	-	5.4	36.6	1.365	46	7.9
19	7.47	776	10.8	19.3	100	159.5	22.3	.051	.033	.356	.68	.008	.910	-	8.3	37.6	.595	47.1	8.8
Sept. 4	8.05	724	19.7	15.9	85.5	162.1	97.5	.066	.009	.168	.94	.058	.992	-	4.8	38.4	.893	41.2	6.46

Table 19 c: Lake Wabukayne samples from the north inlet - 1982.

* data not used in calculation of mean
1. Value may not be different from zero

1982	pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				Carbon			Fe	Na	K
								TP	FRP	NH_3	TKN	NO_2	NO_3	TC	TOC	TIC			
*Feb.15	7.60	660	225	255	137	98	29.5	.800	.170	.44	2.95	.015	[1].005	-	11.8	18.4	11.25	-	11.2
June 8	7.78	1620	1.84	1.66	304	257	191	.086	.059	.01	.51	.087	3.615	-	3.2	54	.09	139	9.56
July 6	7.74	1690	.85	1.02	320	268.3	180	.093	.100	.07	.42	.060	3.190	-	2.0	59	.045	134	10.8
19	7.54	1360	1.78	2.20	204	244.8	192	.090	.063	.026	.46	.016	2.880	-	2.7	54	-	99.2	9.76
Sept.14	7.09	578	165	218	77	120.1	71	.800	.051	.70	*7.3	.008	.057	-	5.0	19	9.847	38.2	5.86

Table 19 d: Lake Wabukayne samples collected from the south inlet - 1982

1982	pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				Carbon			Fe	Na	K
								TP	FRP	NH_3	TKN	NO_2	NO_3	TC	TOC	TIC			
Feb. 15	7.76	590	390	448	114	100	29	1.47	.370	1.49	3.80	.102	.725	-	11.5	17.6	20.0	62	18.5
June 8	8.01	1090	14.3	12.8	147	191	170	.077	.022	.014	.72	.031	4.37	-	5.9	40	.870	76	9.9
July 6	8.05	1040	6.3	4.21	116	231.5	148	.049	.037	.036	.67	.028	2.62	-	-	-	-	57.8	12.4
19	7.94	1360	39.0	34.9	204	244.8	32.4	.115	.048	.024	1.27	.068	2.18	-	2.7	54	-	53.9	9.76
Sept. 14	8.10	953	8.0	6.76	73.5	241.2	152.5	.106	.078	.138	.75	.043	2.26	-	*67	50	.335	44.6	11.3

*data not included in calculation of mean

Table 19 e: Lake Wabukayne samples taken from inlet #2 - 1982

*Feb. data not used in calculation of means

1982	pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				Carbon			Fe	Na	K
								TP	FRP	NH_3	TKN	NO_2	NO_3	TC	TOC	TIC			
*Feb.15	1.98	-	-	102	74	0	24	.615	.480	.850	3.2	.003	220	-	18.3	8.8	4.7	43	-
June 8	8.19	960	3.3	1.7	142	214	88	.042	.022	.010	.38	.013	3.535	-	3.1	47.0	.125	56.1	6.6
July 6	7.97	940	75	90.8	135	209.5	75	.128	.03	.006	.75	.067	2.63	-	3.5	42	4.395	47.1	7.5
19	8.09	940	1.54	2.16	143	214.4	83.5	.041	.0315	.058	.33	.009	2.54	-	2.5	45	.110	49.9	6.6
Sept.14	7.19	488	116	135	45.3	122.8	48.9	.335	.035	1.49	4.2	.675	1.78	-	5.2	27.2	7.18	19.6	5.84

Table 19 f:

Lake Wabukayne samples from the inlet below the sedimentation basin - 1982.

	pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				Carbon			Fe	Na	K
								TP	FRP	NH_3	TKN	NO_2	NO_3	TC	TOC	TIC			
June 8	7.64	604	56	21.5	75	102.6	84.5	.195	.074	.008	1.13	.009	3.69	-	6.6	24.2	2.885	37.5	6.1
July 6	7.95	619	25	14.1	71	125.2	74.5	.130	.095	.120	1.18	.011	3.59	-	6.1	28.8	1.05	34	7.06
19	7.64	814	4.7	8.15	107	163.3	23.5	.095	.015	.088	1.33	.0195	1.48	-	7.0	37.0	.100	50.9	9.26
Sept.14	8.35	639	8.9	5.69	69	141.6	86.1	.035	.006	.088	.70	.049	.901	-	4.9	20.2	.312	35	5.96

Table 19 g: Lake Wabukayne outlet samples - 1982.

* Feb. data not used in calculation of mean.

1982	pH	Cond.	Turb.	Susp. Solids	Cl	Alk	SO_4	Phosphorus		Nitrogen				Carbon			Fe	Na	K
								TP	FRP	NH_3	TKN	NO_2	NO_3	TC	TOC	TIC			
*Feb. 15	7.09	555	83	74.5	109	55	35.5	.330	.150	.550	1.70	.051	1.50	-	5.1	16.4	4.85	-	6.2
June 8	7.64	559	46	41.0	69	97.3	77	.208	.077	.014	1.28	.082	3.52	-	6.5	23	3.485	34.7	5.66
July 6	8.46	587	22	3.83	67.5	117.9	70.5	.105	.089	.140	1.08	.250	3.30	-	-	-	.980	31.8	7.1
19	7.76	816	4.5	4.90	105	163	23.8	.055	.014	.126	1.00	.195	1.25	-	7.0	38	.330	50.4	9.16
Sept.14	8.38	630	8.6	5.85	60.5	139.5	85.3	.038	.0075	.086	.67	.048	.902	-	4.8	33	.293	33.6	5.9

Table 20a: Lake Wabukayne - lake station samples collected as composites through the suphotic zone - 1983

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus		NH_3	Nitrogen		NO_3	TOC	TIC	Chlorophyll		Secchi disc
								Tot.	SRP		TKN	NO_2				a	Acidified a	
May 19	-	-	-	-	-	111.0	-	-	-	-	-	-	-	-	-	14.9	13.3	0.5
31	7.43	382.0	61.00	49.30	34.50	82.8	45.27	.250	.1330	.750	0.950	.1400	1.170	5.6	23.5	11.2	8.5	0.2
June 14	7.89	628.0	4.50	6.89	76.00	138.5	84.40	.070	.0025	.008	0.620	.500	1.420	4.8	34.5	8.6	5.5	0.75
30	7.44	504.0	13.00	18.40	54.90	99.7	70.35	.110	.0175	.322	0.900	.0755	.755	6.6	25.4	19.1	14.1	0.5
July 12	7.73	614.0	10.00	15.40	72.00	133.2	94.30	.060	.0090	.242	1.130	.056	.364	6.6	31.0	21.0	16.6	0.7
26	7.56	793.0	6.00	13.40	41.20	166.4	116.30	.116	.0460	.440	1.280	.215	0	6.4	44.5	19.2	13.5	0.8
Aug. 9	7.47	474.0	28.00	47.10	47.30	110.1	57.33	.135	*.0015	.140	1.130	.191	.559	5.9	28.3	9.6	8.0	0.15
22	7.85	305.0	88.00	86.60	*23.60	73.3	*38.74	.185	.0640	*.004	0.650	.0285	1.220	4.5	18.6	4.8	3.8	0.1
Sept.27	7.78	371.0	16.20	2.72	31.2	93.8	47.78	.085	.009	.246	1.17	.0645	.551	4.5	23.2	28.1	24.1	0.4

*Value tentative

Table 20b: Lake Wabukayne - lake station samples collected from 1 m above the bottom - 1983

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus		Nitrogen			TOC	TIC	Fe	Na	K
								Tot.	SRP	NH_3	TKN	NO_2	NO_3					
May 19	7.70	630.0	13.00	18.20	74.00	135.3	87.40	.100	.0120	.550	1.410	.0495	.960	4.8	33.7	.470	37.40	4.62
31	7.44	380.0	57.00	49.50	34.70	83.4	45.42	.240	.1230	.750	.950	.1400	1.170	5.6	23.5	3.500	20.70	4.42
June 14	7.64	676.0	5.00	5.81	84.00	151.1	91.00	.089	.0385	.010	.830	.1080	2.370	4.9	34.5	.200	38.20	5.90
30	7.29	495.0	30.00	27.50	52.30	102.2	66.70	.116	.0255	.224	.690	.0660	.884	6.2	27.2	1.525	27.20	5.63
July 12	7.64	629.0	15.00	14.30	72.00	134.1	85.45	.072	.0130	.284	1.280	.0690	.381	6.4	32.8	.450	36.00	7.20
26	7.75	801.0	15.50	20.10	39.90	168.5	115.90	.116	.0495	.010	.860	.3200	.610	6.2	45.0	.670	49.30	8.86
Aug. 9	7.43	493.0	30.00	44.30	52.70	115.2	57.89	.130	.0015	.08	1.080	.2350	.620	6.0	29.8	1.640	27.20	5.45
22	7.60	182.0	157.00	93.20	*11.50	53.8	*21.03	.275	.084	.060	.950	.3530	.767	3.5	13.3	8.850	6.45	5.14
Sept. 27	7.77	388.0	22.00	13.10	35.3	98.1	50.23	.075	.0175	.250	.910	.0745	.660	3.9	24.4	.980	18.50	4.32

*Value tentative

Table 20c: Lake Wabukayne - north inlet samples - 1983

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus		Nitrogen				TOC	TIC	Fe	Na	K
								Tot.	SRP	NH_3	TKN	NO_2	NO_3					
May 19	7.70	1490.0	1.60	2.64	213.5	293.8	191.50	.046	.0370	.014	.260	.0045	2.65	1.8	76.0	0.040	105.5	8.80
31	8.55	532.0	9.70	8.02	83.0	95.8	51.47	.040	.0090	.100	.520	.0145	0.27	3.7	22.7	0.500	50.3	3.56
June 14	7.45	1470.0	0.50	2.12	234.0	292.2	198.00	.067	.0555	.008	.280	.0750	2.29	2.1	77.0	0.040	108.0	9.86
12	7.54	1400.0	0.60	1.97	203.0	294.7	-	.283	.1800	.022	.520	.0100	2.56	2.9	69.0	0.035	-	-
July 26	7.82	1390.0	0.35	8.04	-	298.1	192.55	.140	.0940	.018	.550	.0115	2.53	2.9	78.5	0.180	91.0	9.56
Aug. 9	7.73	1178.0	2.70	5.80	159.0	256.4	157.88	.050	.0410	.008	.280	.0190	2.63	3.0	66.0	0.075	-	8.40
22	7.77	644.0	49.00	58.70	56.3	153.3	86.20	.250	.1300	.008	1.150	.0260	3.03	7.6	41.0	2.650	34.9	19.60
Sept.27	7.59	1390.0	1.40	15.20	185.0	292.1	191.00	.170	.1480	.244	.490	.0090	2.09	2.3	71.0	0.055	89.3	10.60

Table 20d: Lake Manukayne - south inlet samples - 1983

Date	pH	Cond.	Turt.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus		Nitrogen				TOC	TIC	Fe	Na	K
								Tot.	SRP	NH_3	TKN	NO_2	NO_3					
May 19	8.17	1080.0	0.60	1.32	104.50	261.8	176.80	.043	.0370	.156	.380	.020	3.03	1.7	65.0	*0.005	52.3	7.16
31	7.37	804.0	50.00	60.70	85.00	155.1	257.35	.150	.0200	.970	1.400	.600	2.30	11.4	43.5	3.000	49.7	12.90
June 14	7.92	1025.0	2.50	7.09	114.00	252.9	165.50	.152	.0750	.022	.700	.040	2.41	3.4	65.0	0.070	54.4	11.60
30	8.15	1039.0	3.50	4.35	103.00	263.2	167.25	.069	.0420	.042	.340	.022	2.93	2.9	66.0	0.154	50.6	9.30
July 12	8.05	996.0	1.20	2.77	91.00	271.3	154.20	.315	.2200	.144	.600	.248	2.59	2.8	61.0	0.045	44.9	9.50
26	8.10	956.0	1.50	4.10	31.80	258.8	150.20	.112	.0905	.006	.460	.275	2.76	3.4	67.5	0.045	45.2	5.46
Aug. 9	8.15	968.0	2.50	4.33	-	263.8	152.64	.060	.0530	.016	.310	.182	2.32	3.5	65.0	0.065	44.2	9.70
22	7.70	666.0	17.50	36.30	57.50	141.8	103.45	.255	.1500	.006	1.950	.267	2.13	9.5	35.0	1.650	40.0	8.50
Sept.27	8.21	995.0	1.33	6.80	106.00	248.8	148.00	.110	.0075	.212	.480	.069	0.53	2.0	62.5	*0.030	53.4	7.36

*Value tentative

Table 10e: Lake Nabukayma - outlet samples - 1963

Date		pH	Conc.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus		Nitrogen				TOC	TIC	Fe	Na	K
									Tot.	SRP	NH_3	TKN	NO_2	NO_3					
May	19	7.70	568.0	14.00	22.60	67.50	113.1	78.45	.082	*.001	.430	1.370	.050	.710	4.5	27.1	0.345	35.1	4.30
	31	7.38	371.0	45.00	48.50	33.80	81.7	44.43	.265	.130	.810	.900	.170	1.060	5.2	23.1	3.500	20.7	4.28
June	30	7.52	500.0	14.00	15.80	55.10	98.2	67.15	.095	.008	.244	.920	.071	.764	6.7	25.1	0.732	28.4	5.74
	14	8.46	574.0	4.00	9.43	70.00	123.6	77.85	.052	.011	.252	1.150	.165	1.090	5.1	30.0	0.340	33.8	5.28
July	12	7.82	612.0	12.00	13.20	72.00	125.8	85.25	.052	.007	.146	1.400	.050	.365	6.4	30.4	0.136	36.0	7.26
	26	7.73	778.0	3.80	6.05	37.20	160.2	109.90	.062	.0265	.054	.680	.375	.070	6.2	40.0	0.230	51.5	8.80
Aug.	9	7.47	479.0	33.00	34.20	47.50	110.6	57.51	.115	*.001	.156	1.030	.198	.577	5.9	28.4	1.630	26.4	5.42
	22	7.55	274.0	82.00	76.40	*22.00	66.9	*33.74	.180	.042	1.000	.900	.245	.705	4.1	17.0	4.250	12.0	4.42
Sept.	27	7.98	369.0	17.00	14.30	32.00	93.3	47.76	.077	.006	.186	1.140	.068	.542	4.3	22.9	0.705	17.7	4.04

*Value tentative

Table 20f: Lake Wabukayne - samples from inlet #2 - 1983

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO.	Phosphorus		Nitrogen				TOC	TIC	Fe	Na	K
								Tot.	SRP	NH_3	TKN	NO_3	NO_2					
May 19	8.09	924.0	2.60	3.58	121.50	231.7	75.50	.045	.021	.066	.420	.010	2.54	2.6	58.5	0.100	-	4.62
31	7.84	829.0	39.00	28.70	106.00	217.5	71.35	.085	.024	.012	.525	.032	2.37	3.4	55.0	1.950	43.00	5.14
June 14	7.72	631.0	.70	3.66	123.00	217.2	69.05	.075	.0485	.022	.390	.106	1.90	2.7	56.5	0.075	41.70	5.96
31	8.09	854.0	.90	1.03	119.00	217.3	68.55	.069	.045	.050	.320	.021	2.26	2.4	56.0	0.015	43.00	4.96
July 12	8.02	790.0	1.40	1.33	108.00	211.9	65.75	.056	.047	.018	.440	.008	2.09	2.4	53.0	0.055	37.30	5.56
26	8.10	777.0	1.80	1.54	39.10	209.7	-	.059	.0455	.008	.300	.099	1.57	2.5	55.5	0.095	42.00	4.90
Aug. 9	8.09	763.0	1.95	4.48	-	209.3	64.56	.030	.022	.016	.270	.031	1.95	2.4	52.0	0.085	38.00	4.98
22	7.98	623.0	5.20	7.07	52.30	173.1	70.10	.114	.066	*.004	.720	.052	3.02	6.3	45.0	0.190	27.90	6.86
Sept. 27	8.18	709.0	.62	*.48	85.60	196.7	60.00	.020	.0135	.022	.240	.0055	1.76	1.8	47.0	0.025	35.50	4.62

*Value tentative

Table 29g: Lake Nabukayne - samples from the inlet below the sedimentation basin - 1983

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus		Nitrogen				TOC	TIC	Fe	Na	K
								Tot.	SRP	NH_3	TKN	NO_2	NO_3					
May 19	7.67	578.0	16.00	21.50	68.50	112.4	80.20	.087	*.001	.450	1.410	.051	.734	4.4	27.4	0.385	35.50	4.36
31	7.34	535.0	62.00	61.00	54.00	114.9	65.85	.270	.088	1.120	1.150	.245	1.900	6.4	32.7	3.630	30.40	5.45
June 14	8.18	609.0	3.80	9.670	75.00	131.1	82.50	.092	.030	.010	.720	.170	1.620	5.0	32.4	0.280	35.80	5.60
30	7.32	515.0	14.00	11.500	54.30	102.4	66.95	.149	.0455	.640	1.330	.083	.657	6.8	26.8	0.805	35.90	5.75
July 12	7.64	630.0	14.00	17.30	72.00	132.8	88.65	.077	.018	.354	1.330	.069	.386	6.6	32.8	0.500	34.50	7.06
26	7.81	785.0	6.50	8.30	35.00	162.3	114.9	.054	.0105	.022	.690	.335	.175	6.3	42.5	0.210	46.60	8.80
Aug. 9	7.52	471.0	31.00	42.50	49.20	108.5	56.2	.108	*.001	.190	1.030	.148	.597	5.9	27.8	1.910	25.00	5.28
22	7.60	352.0	60.00	54.80	*30.70	81.1	*46.2	.145	.046	.086	.850	.270	.730	4.7	20.9	2.950	16.30	4.84
Sept.27	8.02	367.0	15.00	1.44	32.10	92.9	48.12	.100	.015	.194	1.180	.080	2.560	4.6	22.8	0.650	17.80	4.06

*Value tentative

Table 21a: Lake Wabukayne - lake station samples collected as composites through the euphotic zone - 1984

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO4	Phosphorus		Nitrogen				TOC	TIC	Chlorophyll		Secchi disc
								Tot.	SRP	NH_3	TKN	NO_2	NO_3			a	Acidified a	
May 17	5.02	862.0	32.0	38.33	127.70	149.9	99.15	.148	.019	.116	1.34	.058	1.2420	6.2	35.5	20.0	19.0	0.35
June 5	3.16	594.0	14.6	15.02	78.20	107.3	55.59	.091	.011	.108	1.10	.044	1.0160	5.5	24.5	40.0	-	0.40
19	7.93	444.0	159.5	113.80	*45.51	93.9	*38.75	.380	.053	.012	2.63	.060	2.0100	7.8	21.8	73.0	68.0	0.10
July 5	7.79	573.0	13.5	13.08	70.65	104.1	70.97	.126	.038	.556	1.57	.056	.9690	7.6	25.4	3.9	-	0.50
16	7.95	737.0	6.5	10.18	80.05	152.6	85.56	.109	.005	.334	1.52	.127	.8930	7.1	36.6	-	-	0.80
Aug. 1	8.23	870.0	11.4	11.48	106.70	173.7	113.12	.063	.0045	.138	1.15	.0565	.6235	7.0	40.0	-	-	0.75
15	3.49	461.0	4.2	15.38	53.78	89.2	55.32	.047	.007	<.002	.87	.0465	.2135	5.6	19.6	-	-	0.70
28	8.30	575.0	7.9	11.12	67.20	114.9	*64.08	.065	.0075	.106	1.10	.0475	.5225	6.9	27.8	16.2	10.2	0.70
Sept.18	8.05	455.0	14.1	11.96	46.30	98.7	51.73	.093	.0315	.256	1.03	.0795	.8505	4.5	24.6	12.6	5.8	0.70
Oct. 9	7.62	515.0	36.0	33.91	*49.85	102.3	60.47	.140	.014	.318	1.60	.0985	1.2815	8.1	26.6	25.3	*30.0	0.23
Nov. 6	7.76	340.0	42.0	32.92	33.78	72.5	37.81	.120	.032	.076	.75	.0405	.6795	3.3	17.3	12.0	10.1	0.25

*Value tentative

Table 21b: Lake Wabukayne - lake station samples collected from 1 m above the bottom - 1984

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus		Nitrogen				TOC	TIC	Fe	Na	K
								Tot.	SRP	NH_3	TKN	NO_2	NO_3					
May 17	7.93	848.0	28.0	19.44	126.10	144.3	96.31	.097	.0360	.216	1.06	.060	1.290	6.3	35.8	1.325	70.8	5.06
June 5	8.41	648.0	28.0	20.28	68.00	120.7	61.86	-	.0330	.110	-	.047	1.313	6.3	29.4	1.100	48.5	4.90
19	7.83	395.0	131.0	96.85	*38.88	86.6	32.56	.343	.1510	.124	1.60	.137	1.793	7.1	20.7	-	24.0	7.30
July 5	7.57	612.0	11.8	13.32	66.15	116.6	65.67	.143	.0390	.598	1.73	.067	.843	7.3	30.8	.460	36.0	5.10
16	7.80	739.0	10.7	12.04	79.50	154.8	85.97	.105	.0050	.386	1.57	.150	.870	7.1	37.0	.465	47.4	6.36
Aug. 1	8.10	379.0	8.7	13.86	90.85	177.7	*112.40	.075	.0035	.226	1.20	.056	.614	6.6	44.0	.375	56.5	7.40
16	8.07	489.0	15.3	15.43	52.80	99.2	56.55	.064	.0055	.036	.98	.067	.2335	5.7	19.6	.370	28.4	4.80
28	8.32	575.0	6.6	10.18	65.40	114.7	*65.21	.055	.0040	.106	.95	.046	.509	6.9	27.8	.195	34.9	4.92
Sept. 18	7.88	455.0	14.9	11.27	46.60	98.1	51.54	.088	.0330	.260	1.02	.082	.8485	4.6	24.4	.585	25.5	4.14
Oct. 9	8.14	710.0	18.4	18.60	75.30	143.4	83.91	.085	.0040	.130	1.27	.066	.784	6.3	36.2	.615	41.6	5.36
Nov. 6	7.78	345.0	46.0	26.55	34.97	74.2	38.62	.133	.0310	.072	.77	.042	.703	3.4	17.5	2.075	18.6	3.44

*Value tentative

Table 21c: Lake Wabukayne - north inlet samples - 1984

Date	pH	Cond.	Turt.	Susp. Solids	Cl	Alk.	SO4	Phosphorus		Nitrogen			TOC	TIC	Fe	Na	K
								Tot.	SRP	NH3	TKN	NO2	NO3						
May 17	7.86	1900.0	17.5	3.104	318.75	265.1	140.60	.086	.0660	.088	.350	.0280	3.0720	1.9	73.0	0.095	164.0	8.50
June 5	8.18	1670.0	3.5	1.812	212.4	277.8	189.30	.240	.1980	1.180	1.600	.0865	3.1335	2.7	74.0	0.055	136.0	9.50
19	7.92	1370.0	5.1	2.640	218.9	258.7	148.00	.144	.1370	.032	.530	.0210	3.3290	3.3	65.0	0.080	115.0	9.40
July 5	7.88	1690.0	2.6	3.132	255.15	291.4	169.85	.075	.0610	.064	.440	.0355	2.8045	2.6	72.0	0.100	127.0	9.00
16	7.84	1610.0	3.7	3.956	215.2	287.3	183.50	.094	.0775	.146	.570	.0955	3.3945	4.1	71.5	0.185	112.0	9.86
Aug. 1	8.26	1030.0	4.8	3.424	96.75	250.1	147.40	.098	.0775	.110	.640	.0415	2.1685	4.5	61.0	0.155	49.8	8.25
16	7.9	1640.0	14.1	11.050	237.45	294.2	178.75	.263	.2100	.076	.580	.0505	2.6095	2.6	13.5	0.275	122.0	11.10
29	7.62	1560.0	5.5	4.992	244.1	286.7	181.00	.086	.0795	.062	.350	.0440	2.3560	2.7	71.5	0.240	116.0	10.50
Sept. 18	7.46	997.0	3.6	7.872	192.1	118.7	76.11	.146	.0540	.006	13.300	.0215	1.7785	5.1	28.0	0.130	85.6	6.10
Oct. 9	7.86	680.0	102.0	53.830	*76.95	114.3	*90.65	.158	.0555	.088	1.150	.0835	1.2665	6.1	28.9	4.900	46.0	4.86
Nov. 6	7.83	1430.0	1.2	0.788	212.1	281.0	158.00	.069	.0655	.014	.270	.0065	2.2135	2.1	67.5	0.050	108.0	9.72

*Value tentative

Table 21c: Lake Wabukayne - south inlet samples - 1984

Date	pH	Cond.	Turt.	Susp. Solids	Cl	Alk.	SO.	Phosphorus			Nitrogen			TOC	TIC	Fe	Na	K
								Tot.	SRP	NH_3	TKN	NO_2	NO_3					
May 17	6.22	1360.0	18.e5	1.288	179.54	259.0	171.4	.033	.0210	.078	.370	.0090	2.4910	2.6	64.0	0.050	86.4	6.80
June 5	8.29	1284.0	10.50	13.88	154.90	257.7	160.4	.049	.0330	.082	.570	.0140	2.5560	2.3	66.0	0.385	94.8	8.20
19	8.13	1002.0	17.20	13.17	143.25	205.1	154.0	.086	.0435	.026	.970	.0175	2.5525	8.0	50.5	0.620	82.3	8.06
July 5	8.15	1142.0	4.70	1.076	118.40	252.5	150.6	.043	.0355	.124	.600	.0500	-	5.3	65.0	0.045	51.2	7.66
16	8.15	1162.0	4.70	.944	105.15	268.5	168.7	.027	.0210	.032	.460	.0325	2.7575	6.6	66.0	0.105	57.3	8.50
Aug. 1	7.99	1610.0	1.40	1.048	236.40	287.0	183.5	.490	.1150	.546	1.020	.2680	2.9220	2.8	70.0	0.055	119.0	11.60
16	8.28	1061.0	7.50	1.330	97.40	261.5	131.5	.063	.0535	.052	.360	.0130	2.1900	2.8	64.5	0.070	51.1	8.12
28	8.16	1099.0	1.50	1.528	108.90	271.0	928.8	.102	.0935	.310	.680	.0280	1.9520	2.6	65.5	0.105	52.0	7.48
Sept.18	8.15	1188.0	29.00	24.62	132.15	268.4	175.8	.065	.0325	.038	.420	.0185	2.2515	3.1	64.5	6.500	69.7	8.12
Oct. 9	7.66	700.0	6.10	4.604	87.34	134.7	78.5	.118	.0860	.040	.530	.0715	2.1685	6.1	28.9	0.270	40.1	4.72
Nov. 6	8.25	1136.0	1.98	1.04	127.05	256.0	158.4	.034	.0275	.014	.300	.0115	1.8685	2.5	60.0	0.105	69.4	7.74

Table 21e: Lake Wabukayne - outlet samples - 1984

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus		Nitrogen				TOC	TIC	Fe	Na	K
								Tot.	SRP	NH_3	TKN	NO_2	NO_3					
May 17	8.05	863.0	24.5	17.18	131.05	147.5	99.52	.119	.026	.144	.930	.0590	1.3410	6.1	36.6	1.050	69.6	5.02
June 5	7.96	590.0	18.2	14.97	74.70	106.2	57.69	.085	.0095	.096	1.020	.0425	.9775	5.7	24.3	0.550	43.4	4.22
19	7.89	440.0	129.0	105.00	*43.43	96.1	¢38.38	.350	.067	.042	2.120	.0725	2.0375	7.6	21.8	5.250	22.9	5.52
July 5	7.91	546.0	8.5	11.64	67.70	97.2	59.99	.118	.042	.582	1.590	.0495	.6855	7.4	24.4	0.300	31.8	4.72
16	8.23	728.0	7.0	8.63	73.30	150.7	82.99	.064	<.0025	.140	1.170	.1010	.9790	6.8	35.0	0.265	45.9	6.34
Aug. 1	8.30	856.0	7.9	9.90	104.00	165.3	*114.58	.038	<.0025	.036	.880	.0525	.5725	6.9	41.0	0.205	55.9	7.30
16	8.47	456.0	10.7	14.30	52.88	85.3	54.82	.041	.0045	<.004	.890	.0460	.2140	5.7	19.0	0.245	27.2	4.58
28	8.42	570.0	6.3	11.10	67.30	114.2	*68.49	.050	.0035	.060	.960	.0460	.5040	6.9	27.1	0.185	35.4	4.90
Sept. 18	8.00	450.0	12.8	9.09	49.70	97.3	51.36	.103	.0265	.194	1.020	.0795	.8555	4.5	23.8	0.510	25.6	4.02
Oct. 9	7.50	430.0	42.0	36.40	*43.38	85.8	50.99	.140	.0185	.374	1.580	.1070	1.3330	8.0	22.6	1.910	22.1	3.42
Nov. 6	7.75	335.0	43.0	30.29	33.01	71.3	37.06	.123	.034	.074	.750	.0410	.6990	3.3	16.9	2.075	17.9	3.30

*Vaalue tentative

Table 21f: Lake Wabukayne - samples from Inlet #2 - 1984

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO4	Phosphorus		Nitrogen				TOC	TIC	Fe	Na	K
								Tot.	SRP	NH_3	TKN	NO_2	NO_3					
May 17	8.21	983.0	6.80	1.575	145.04	212.9	73.56	.064	.0280	.100	.330	.0490	2.5510	2.15	51.0	0.050	52.7	4.70
June 5	8.24	841.0	118.50	112.400	109.70	186.1	64.17	.165	.0695	.078	.700	.0500	2.0200	3.6	49.0	6.05	43.1	7.30
19	8.07	893.0	12.20	10.090	113.70	202.2	64.81	.059	.0395	.026	.500	.0185	2.6115	3.6	50.0	0.355	35.8	5.56
July 5	8.07	886.0	0.97	0.835	112.85	201.4	64.35	.021	.0190	.030	.290	.0355	.1745	1.9	51.0	0.055	40.7	5.42
16	8.13	863.0	3.60	1.844	101.40	200.9	73.27	.045	.0435	.076	.420	.0405	2.1295	3.3	50.0	0.075	47.0	6.50
Aug. 1	8.10	753.0	12.10	15.160	85.98	177.4	66.04	.182	.1450	.090	.860	.1060	1.7740	5.0	41.5	0.485	39.9	8.00
16	8.13	705.0	12.80	5.852	77.50	171.7	57.91	.129	.1050	.178	.900	.0565	1.4235	6.0	43.0	0.165	34.8	6.14
28	7.56	690.0	35.00	91.120	72.70	155.5	73.14	.150	.0220	.204	1.600	.0420	2.8280	16.1	40.0	1.700	38.6	4.78
Sept. 18	8.13	765.0	1.09	1.116	93.25	195.7	60.94	.021	.0160	.040	.280	.0275	1.8525	2.1	47.5	0.060	39.8	4.90
Oct. 9	8.04	705.0	3.50	1.992	79.32	174.3	58.77	.041	.0330	.014	.370	.0255	2.1645	3.9	43.5	0.115	32.6	5.02
Nov. 6	8.19	695.0	1.19	0.512	74.90	179.7	52.48	.021	.0190	.048	.260	.0125	1.5275	1.8	42.0	0.060	35.8	4.86

Table 21g: Lake Wabukayne - samples from the inlet below the sedimentation basin - 1984

Date	pH	Cond.	Turt.	Susp. Solids	Cl	Alk.	SO.	Phosphorus		Nitrogen				TOC	TIC	Fe	Na	K
								Tot.	SRP	NH_3	TKN	NO_2	NO_3					
May 17	8.17	1078.0	16.0	15.25	161.05	188.8	110.40	.072	.014	.110	.77	.042	1.7580	4.5	49.0	0.670	81.0	5.82
June 5	8.39	610.0	21.0	23.09	76.50	109.8	59.03	.163	.0075	.112	1.82	.0435	.9765	5.9	26.1	0.680	44.7	4.24
19	7.80	473.0	104.0	102.60	47.24	94.5	42.29	.370	.0465	.044	2.55	.0805	2.0195	7.9	23.0	4.800	27.9	5.64
July 5	8.85	545.0	3.5	10.43	76.15	79.2	62.63	.039	<.002	.116	.75	.0365	.1135	7.3	17.8	0.190	38.9	5.06
16	8.08	752.0	14.4	10.54	-	156.9	91.15	.079	.005	.290	1.42	.0995	1.0005	7.1	37.0	0.365	49.8	6.50
Aug. 1	8.12	858.0	11.0	21.96	100.95	166.5	114.22	.069	.004	.292	1.44	.0620	.6080	7.5	40.0	0.290	56.3	7.50
16	8.31	527.0	11.2	17.81	56.48	107.1	62.96	.067	.004	<.002	1.04	.0470	.3530	5.6	24.2	0.385	31.0	5.08
28	8.10	720.0	12.9	16.09	79.50	152.5	83.70	.052	.0035	.140	1.14	.0520	.7530	5.8	37.5	0.475	43.9	5.74
Sept.18	7.69	525.0	13.5	15.86	54.95	113.7	59.64	.092	.0385	.414	1.20	.0950	.9050	4.7	26.8	0.780	30.8	4.58
Oct. 9	7.54	265.0	57.0	42.42	25.70	55.6	13.30	.148	.038	.284	1.17	.0835	1.1265	5.0	13.9	3.100	14.0	2.38
Nov. 6	7.77	370.0	44.0	30.86	37.36	80.3	41.76	.118	.0345	.128	.82	.0445	.7355	3.5	19.1	2.250	20.0	3.56

Table 22a: Lake Wabukayne - lake station samples collected as composites through the euphotic zone - 1985

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus		Nitrogen				TOC	TIC	Chlorophyll		Secchi disc
								Tot.	SRP	NH_3	TKN	NO_2	NO_3			a	Acidified a	
May 7	8.10	832.0	45.00	28.640	151.90	100.4	75.60	0.145	0.0080	0.192	1.380	0.0525	1.2775	5.0	25.2	*43.7	*1.5	0.3
June 13	8.08	879.0	17.90	13.660	137.10	142.7	77.55	0.094	0.0080	0.250	1.340	0.0470	0.728	6.8	34.0	45.4	37.9	0.7
July 11	8.11	485.0	31.00	21.580	66.00	96.2	42.40	0.113	*0.0020	0.168	1.120	0.0500	0.695	5.9	22.6	43.5	27.8	0.7
Aug. 1	7.98	80.5	22.00	17.450	104.65	151.4	77.85	0.103	0.0350	0.414	1.270	0.0455	0.6895	6.4	36.8	32.1	23.5	0.5
Oct. 7	8.00	699.0	23.00	21.280	96.30	141.1	72.00	0.084	0.0140	0.148	0.990	0.0560	1.044	5.0	34.6	11.0	-	0.5

*Value tentative

Table 22b: Lake Wabukayne - lake station samples collected from 1 m above the bottom - 1985

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO.	Phosphorus			Nitrogen			TOC	TIC	Fe	Na	K
								Tot.	SRP	NH_3	TKN	NO_2	NO_3					
May 5	7.92	484.0	32.00	24.280	161.30	125.8	87.45	0.158	0.0060	0.212	1.550	0.0575	1.4125	5.4	31.8	1.230	88.90	5.12
June 13	8.04	879.0	15.20	15.320	143.60	143.6	78.00	0.088	0.0135	0.256	1.230	0.0485	0.7315	7.0	34.6	0.500	66.76	5.64
July 11	7.69	469.0	-	-	58.20	97.7	39.50	0.183	0.0175	0.466	1.670	0.2100	0.4250	6.0	24.8	0.910	28.82	3.97
Aug. 1	7.95	807.0	24.00	0.819	110.90	152.6	77.75	0.128	0.0450	0.498	1.500	0.0450	0.6750	6.4	37.6	1.070	50.26	5.62
Oct. 7	8.01	699.9	24.0	20.870	94.35	141.4	71.50	0.075	0.0160	0.166	0.900	0.0550	1.0445	4.9	34.6	0.910	41.90	5.03

Table 22c: Lake Wabukayne - north inlet samples - 1985

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus			Nitrogen			TOC	TIC	Fe	Na	K
								Tot.	SRP	NH_3	TKN	NO_2	NO_3					
May 7	8.22	1570.0	2.70	*1.060	239.25	248.8	169.00	0.040	0.0325	0.042	0.290	0.0190	2.4710	2.4	60.0	0.105	120.50	7.18
July 11	7.80	1870.0	3.60	*0.913	336.30	283.5	197.30	0.098	0.0890	0.028	0.270	0.0215	2.6785	1.9	66.0	0.039	148.70	10.15
Aug. 1	7.80	1800.0	1.35	*1.156	271.55	286.3	184.80	0.139	-	*0.176	0.520	*0.0975	*2.7925	3.0	69.0	0.033	125.40	10.43
Oct. 7	7.78	1870.0	*0.54	*0.300	335.60	314.5	184.05	0.080	0.0910	0.172	0.340	0.0990	2.5510	1.8	64.0	0.035	150.00	10.20

*Value tentative

Table 22d: Lake Wabukayne - south inlet samples - 1985

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO4	Phosphorus		NH3	Nitrogen		NO3	TOC	TIC	Fe	Na	K
								Tot.	SRP		TKN	NO2						
May 7	7.81	1820.0	*0.84	3.060	258.55	275.5	166.00	0.176	0.1760	0.518	0.750	0.0980	3.772	2.3	65.0	*0.045	154.50	8.67
June 13	8.22	1460.0	1.32	*1.584	207.40	273.0	175.25	0.043	0.0410	0.102	0.310	0.0130	2.267	1.8	59.0	*0.030	96.46	7.53
July 11	8.20	1360.0	4.60	3.108	173.25	275.3	179.90	0.101	0.0830	0.306	0.770	0.0185	1.9815	2.3	60.0	0.130	83.20	7.81
Aug. 1	8.22	1262.0	2.80	*1.712	198.60	237.7	121.75	0.045	0.0335	0.056	1.880	0.0225	1.4375	2.1	53.0	0.065	94.20	5.48
Oct. 7	8.13	1265.0	*0.84	*0.549	169.30	272.7	182.30	0.042	0.0415	0.150	0.310	0.0180	2.112	1.7	56.0	0.030	71.40	7.69

*Value tentative

Table 22e: Lake Wabukayne - outlet samples - 1985

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus		Nitrogen				TOC	TIC	Fe	Na	K
								Tot.	SRP	NH_3	TKN	NO_2	NO_3					
May 7	8.18	824.0	42.00	46.260	146.75	100.4	74.30	0.320	0.0105	0.222	2.820	0.0610	1.2290	5.3	25.6	1.850	74.06	4.36
June 13	8.23	876.0	14.70	13.170	144.80	142.3	78.30	0.059	0.0045	0.126	1.020	0.0475	0.7325	6.8	33.6	0.380	68.62	5.51
July 11	8.49	465.0	-	-	61.75	92.1	41.15	0.057	*0.0010	0.102	0.850	0.0995	0.7205	5.7	20.6	0.340	30.46	3.90
Aug. 1	8.10	806.0	19.60	15.330	109.45	150.9	75.55	0.065	0.0085	0.242	1.040	0.0430	0.6770	6.3	36.4	0.794	51.01	5.44
Oct. 7	8.15	696.0	15.50	13.740	96.40	140.7	71.30	0.048	0.0075	0.088	0.730	0.0560	1.0440	5.1	34.2	0.610	43.80	4.73

*Value tentative

Table 12f: Lake Wabukayne - samples from Inlet #2 - 1985

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus		NH_3	Nitrogen		NO_3	TOC	TIC	Fe	Na	K
								Tot.	SRP		TKN	NO_2						
May 7	8.19	1143.0	3.20	2.172	187.55	214.0	68.15	0.038	0.0315	0.010	0.210	0.0120	2.598	2.0	53.0	0.145	74.20	5.55
June 13	8.16	1003.0	2.60	*1.660	163.50	198.8	63.55	0.028	0.0240	0.012	0.230	0.0040	2.116	2.1	44.0	*0.030	61.48	5.53
July 11	8.16	962.0	7.50	2.740	149.10	204.8	64.30	0.064	0.0355	*0.006	0.300	0.0075	2.1125	2.3	46.0	0.130	56.40	5.81
Aug. 1	8.12	927.0	5.40	2.758	126.10	198.9	61.80	0.123	0.1020	0.246	0.840	0.0725	1.9975	3.2	47.0	0.184	52.68	5.71
Oct. 7	8.19	934.0	0.38	*0.037	136.10	212.3	62.80	0.021	0.0170	0.018	0.170	0.0120	1.888	1.8	42.0	0.013	56.00	6.05

*Value tentative

Table 22g: Lake Wabukayne - samples from the inlet below the sedimentation basin - 1985

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO.	Phosphorus			Nitrogen			TOC	TIC	Fe	Na	K
								Tot.	SRP	NH_3	TKN	NO_2	NO_3					
May 7	7.99	709.0	57.00	0.790	113.85	87.7	62.00	0.123	0.0240	0.202	1.050	0.0565	1.2135	4.3	22.2	2.550	59.50	4.00
June 13	8.16	890.0	14.90	15.540	143.80	145.2	80.25	0.079	0.0040	0.192	1.250	0.0470	0.773	7.1	34.2	0.495	67.94	5.51
July 11	8.55	486.0	-	-	66.55	95.2	43.10	0.057	*0.0010	0.070	0.800	0.0970	0.748	5.9	21.2	0.450	31.46	4.10
Aug. 1	8.13	807.0	19.10	16.870	105.05	151.7	79.00	0.059	0.0055	0.218	1.010	0.0425	0.6725	6.3	36.2	0.683	50.62	5.61
Oct. 7	7.95	768.0	32.00	28.260	107.10	154.5	78.30	0.077	0.2450	0.198	0.960	0.0550	1.165	4.5	38.0	1.100	48.20	5.20

*Value tentative

Table 19a: Lake Wabukayne - lake station samples collected as composites through the euphotic zone - 1986

Date	pH	Cond.	Turt.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus		Nitrogen				TOC	TIC	Chlorophyll		Secchi disc
								Tot.	SRP	NH_3	TKN	NO_2	NO_3			a	Acidified a	
May 12	-	-	5.40	5.6	343.00	-	123.00	0.050	0.0190	0.142	0.820	0.0430	1.197	3.2	39.0	1.4	*0.2	2.6
June 9	7.90	993.0	17.60	17.2	174.00	151.2	81.80	0.099	0.0460	0.326	1.070	0.0870	1.413	5.2	36.0	10.3	3.4	0.5
July 8	8.32	901.0	8.50	7.7	157.00	149.5	78.65	0.067	0.0140	0.210	0.940	0.0630	0.832	5.4	35.2	4.8	1.2	0.8
Aug. 11	8.08	528.0	22.00	16.2	76.50	101.8	45.85	0.068	0.0055	0.164	0.800	0.0505	0.7445	5.3	23.4	41.9	35.1	0.6

*Value tentative

Table 23b: Lake Wabukayne - lake station samples collected from 1 m above the bottom - 1996

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus		Nitrogen				TOC	TIC	Fe	Na	K
								Tot.	SRP	NH_3	TKN	NO_2	NO_3					
May 12	-	-	5.90	5.5	340.50	-	122.00	0.054	0.0245	0.166	0.840	0.0430	1.167	3.2	39.2	0.410	167.00	6.960
June 9	7.86	1180.0	14.10	14.3	214.00	184.8	92.30	0.112	0.0375	0.374	1.310	0.1090	1.461	5.1	40.0	0.480	107.00	6.320
July 8	8.28	903.0	9.40	8.2	156.00	150.4	78.25	0.067	0.0140	0.210	0.880	0.0635	0.8165	5.5	35.6	0.300	73.80	5.420
Aug. 11	7.99	534.0	23.00	21.3	79.00	102.2	45.95	0.075	0.0060	0.162	0.900	0.0530	0.762	5.2	23.6	0.890	39.10	3.480

Table 23c: Lake Wabukayne - north inlet samples - 1986

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus		Nitrogen				TOC	TIC	Fe	Na	K
								Tot.	SRP	NH_3	TKN	NO_2	NO_3					
May 12	7.83	2430.0	3.30	5.7	495.00	298.1	190.00	0.120	0.1000	0.140	0.510	0.0825	2.3175	1.2	67.0	4.800	221.00	9.20
June 9	7.76	2050.0	1.20	2.8	408.00	281.6	167.00	0.188	0.1220	0.310	0.450	0.4200	2.710	1.9	62.0	0.030	193.00	9.40
July 8	7.97	1870.0	3.50	2.2	381.00	290.8	156.00	0.255	0.1950	0.800	1.520	0.2600	2.800	3.7	62.0	0.098	160.00	10.10
Aug. 11	8.19	1690.0	2.50	2.8	-	273.0	157.00	0.087	0.0825	0.154	0.420	0.1080	2.512	2.7	57.0	0.110	140.00	8.74

Table 23d: Lake Wabukayne - south inlet samples - 1956

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus		NH_3	Nitrogen			TOC	TIC	Fe	Na	K
								Tot.	SRP		TKN	NO_2	NO_3					
May 12	8.19	1810.0	4.90	3.9	319.00	268.0	184.00	0.097	0.0900	0.098	0.400	0.0270	2.2130	1.5	59.0	0.130	132.00	7.67
June 9	8.24	1770.0	*0.69	3.0	320.00	272.9	181.00	0.049	0.0420	0.088	0.280	0.0200	2.4900	1.7	54.0	0.035	140.00	7.71
July 8	8.29	1570.0	5.70	4.5	272.00	275.5	167.00	0.061	0.0580	0.076	0.410	0.0255	2.4245	2.2	59.0	0.220	109.00	8.30
Aug. 11	8.37	1390.0	4.00	3.6	213.00	250.5	150.00	0.060	0.0510	0.042	0.370	0.0205	0.0205	3.2	48.0	0.150	100.00	6.94

*Value tentative

Table 23e: Lake Wabukayne - samples from below the sedimentation basin - 1996

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO_4	Phosphorus			Nitrogen			TOC	TIC	Fe	Na	K
								Tot.	SRP	NH_3	TKN	NO_2	NO_3					
May 12	8.18	1660.0	5.60	6.1	325.00	177.8	123.00	0.036	0.0098	0.710	0.0415	0.0415	1.885	3.1	39.6	0.460	155.00	7.07
June 9	8.11	946.0	17.40	15.1	167.00	143.3	77.88	0.070	0.0205	0.202	1.050	0.0810	1.399	5.2	33.8	0.620	85.10	5.20
July 8	8.15	905.0	22.00	19.6	154.00	150.8	79.30	0.096	0.0150	0.252	1.260	0.0685	0.9015	6.3	36.0	0.800	73.80	5.61
Aug. 11	7.98	555.0	29.00	24.5	80.50	103.9	49.10	0.083	0.0065	0.154	0.900	0.0510	0.889	5.7	24.2	1.200	40.70	3.65

Table 23f: Lake Wabukayne - samples from Inlet #2 - 1986

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO.	Phosphorus		Nitrogen				TOC	TIC	Fe	Na	K
								Tot.	SRP	NH_3	TKN	NO_2	NO_3					
May 12	8.05	1053.0	5.30	8.0	191.00	196.8	63.40	0.158	0.1170	0.162	0.750	0.0415	2.1185	2.4	45.0	19.000	66.50	49.300
June 9	8.25	1016.0	1.62	1.0	178.00	202.4	58.20	0.030	0.0245	0.010	0.250	0.0020	1.978	2.0	44.0	0.038	65.10	4.730
July 8	8.28	956.0	1.95	1.1	166.00	208.9	62.25	0.025	0.0210	0.014	0.240	0.0045	1.9455	1.9	44.0	0.33	64.40	5.970
Aug. 11	8.40	917.0	1.39	1.8	147.00	209.0	61.80	0.022	0.0185	0.020	0.230	0.0010	1.839	2.3	44.0	0.092	61.20	5.940

Table 23g: Lake Wabuksyne - outlet samples - 1986

Date	pH	Cond.	Turb.	Susp. Solids	Cl	Alk.	SO.	Phosphorus		Nitrogen				TOC	TIC	Fe	Na	K
								Tot.	SRP	NH_3	TKN	NO_2	NO_3					
June 9	7.97	988.0	17.80	15.4	173.50	150.2	80.70	0.092	0.0310	0.268	1.160	0.0860	1.4140	5.3	35.6	0.530	89.90	54.70
July 8	8.35	899.0	7.90	6.8	157.00	148.5	77.75	0.051	0.0060	0.146	0.860	0.0615	0.8335	5.5	34.8	0.230	73.90	5.500
Aug. 11	8.15	518.0	15.30	10.7	77.00	98.1	45.55	0.043	0.0030	0.060	0.600	0.0485	0.7315	5.2	22.6	0.390	38.40	3.440

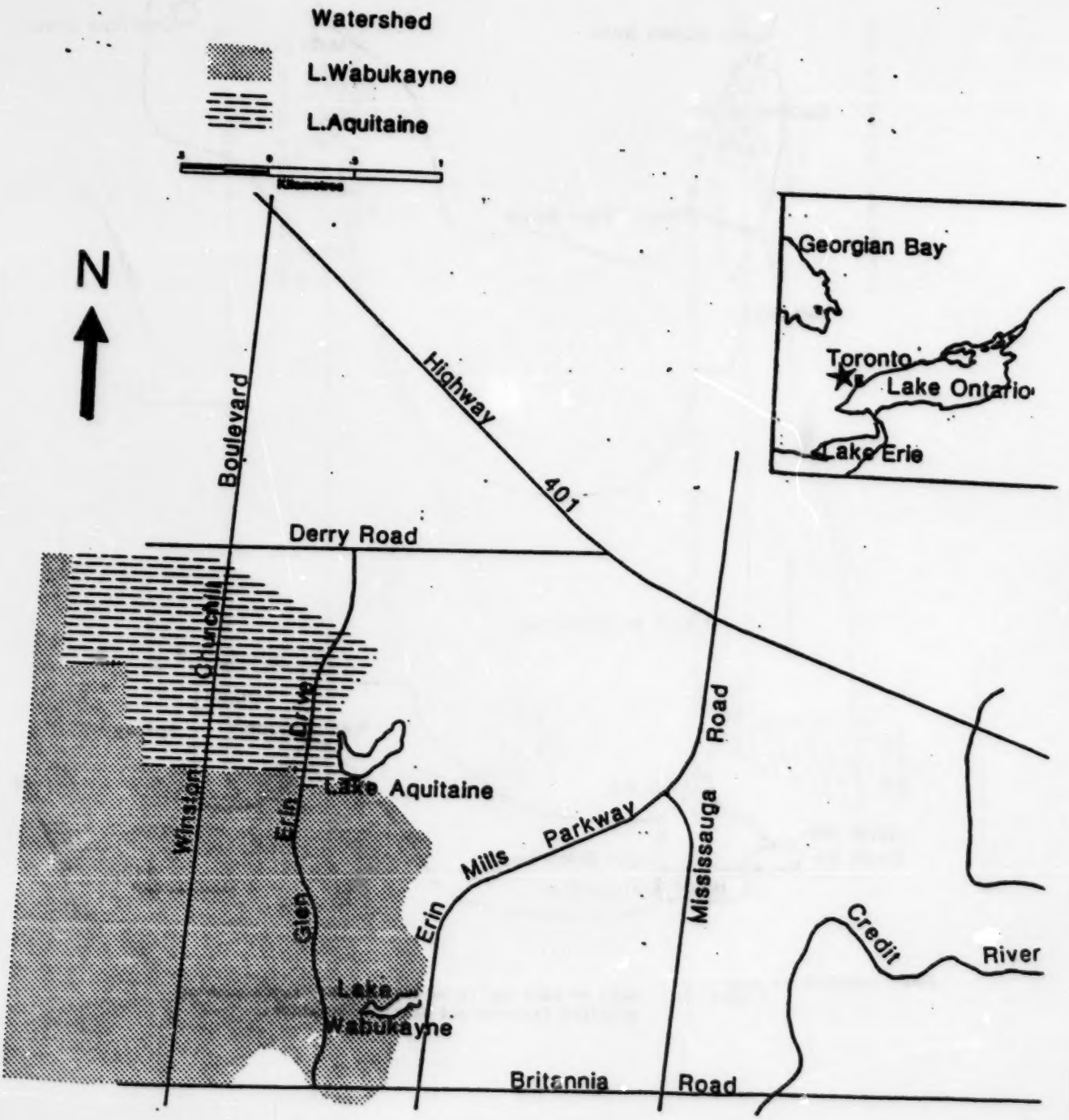

Figure 1: Map showing locations of the two study lakes.

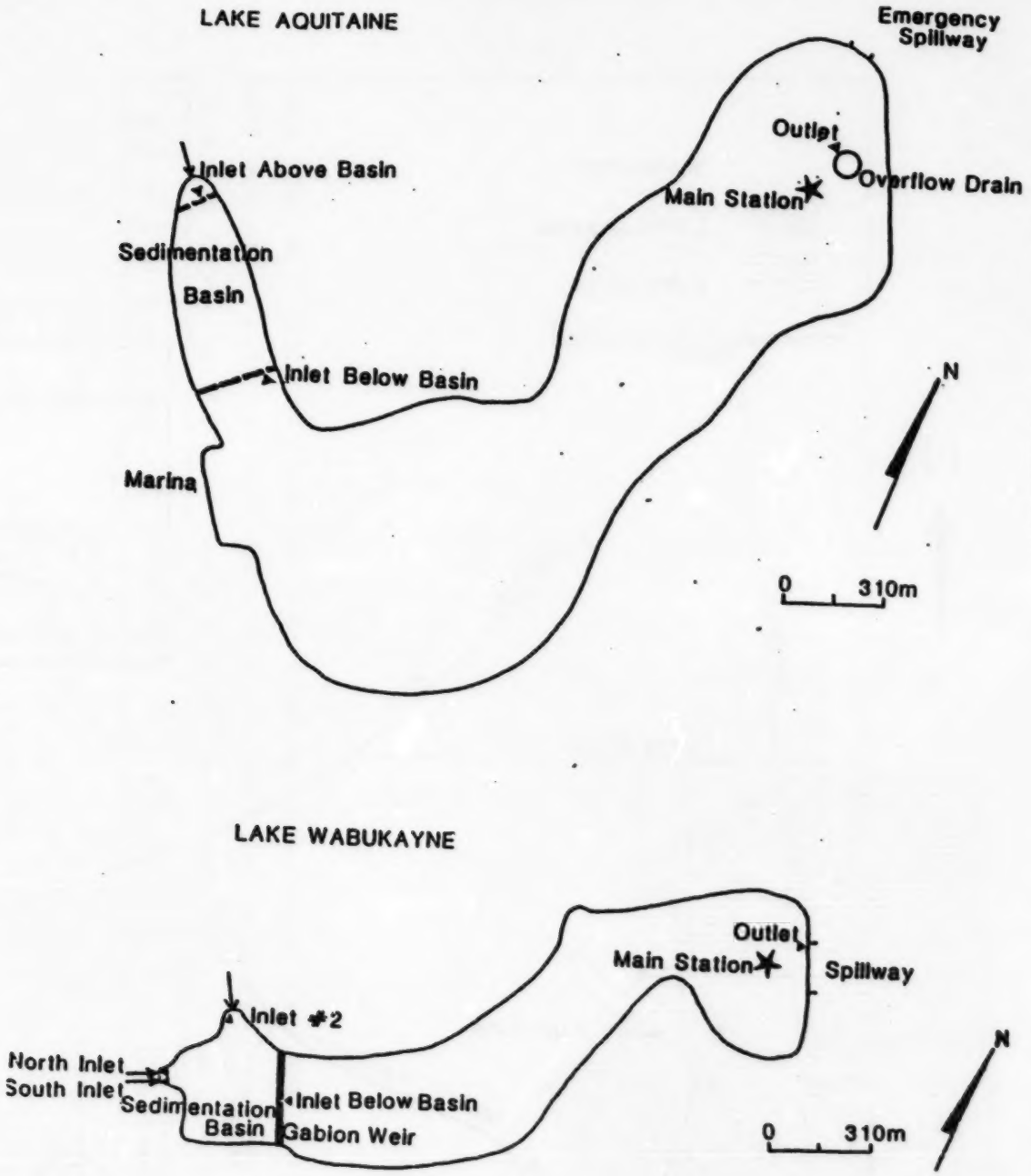

Figure 2: Maps of Lake Aquitaine and Lake Wabukayne showing physical features and sampling locations.

Figure 3: Diagrammatic representation of longitudinal section through Lake Aquitaine (not to scale).

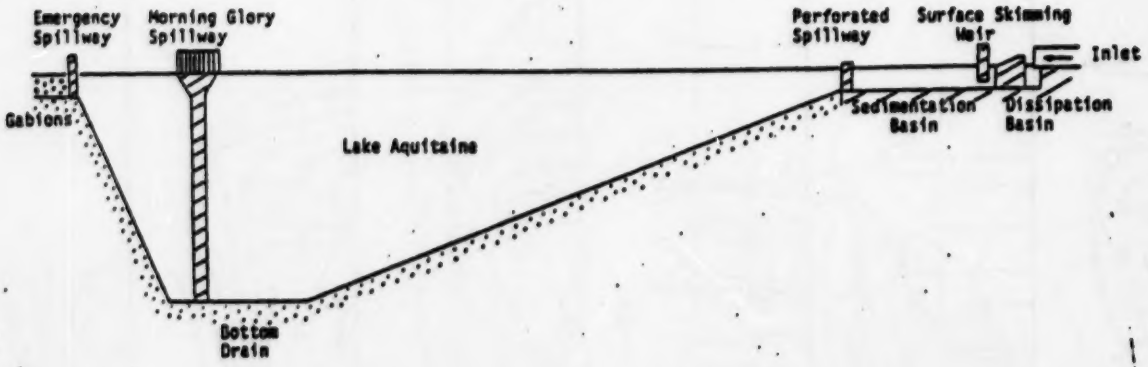

Figure 4: Diagrammatic representation of longitudinal section through Lake Wabukayne (not to scale).

*extended above the surface in 1980.

From Brydges and Robinson (1980)

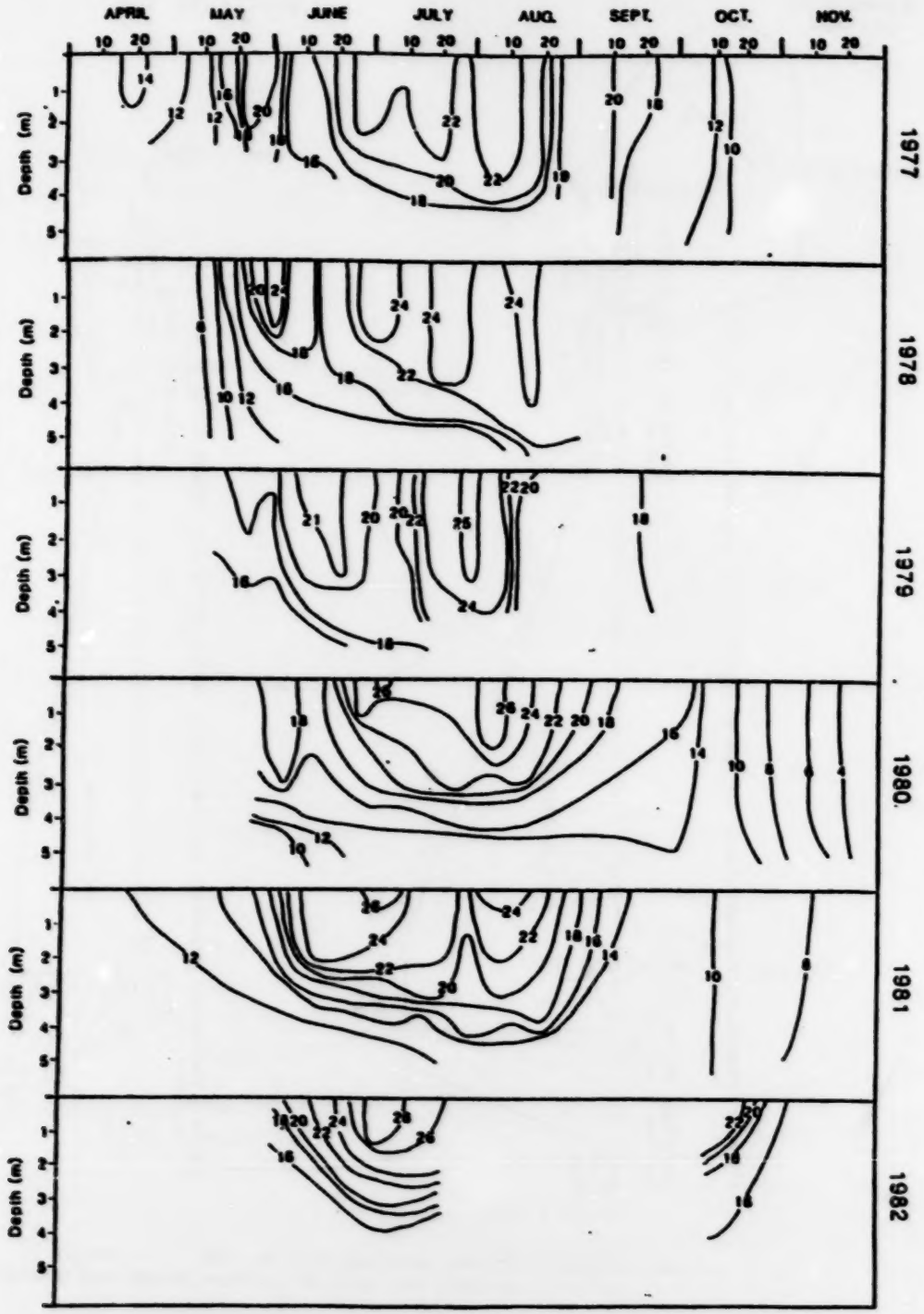

Figure 5a: Lake Aquitaine isotherms during the period 1977 to 1982.

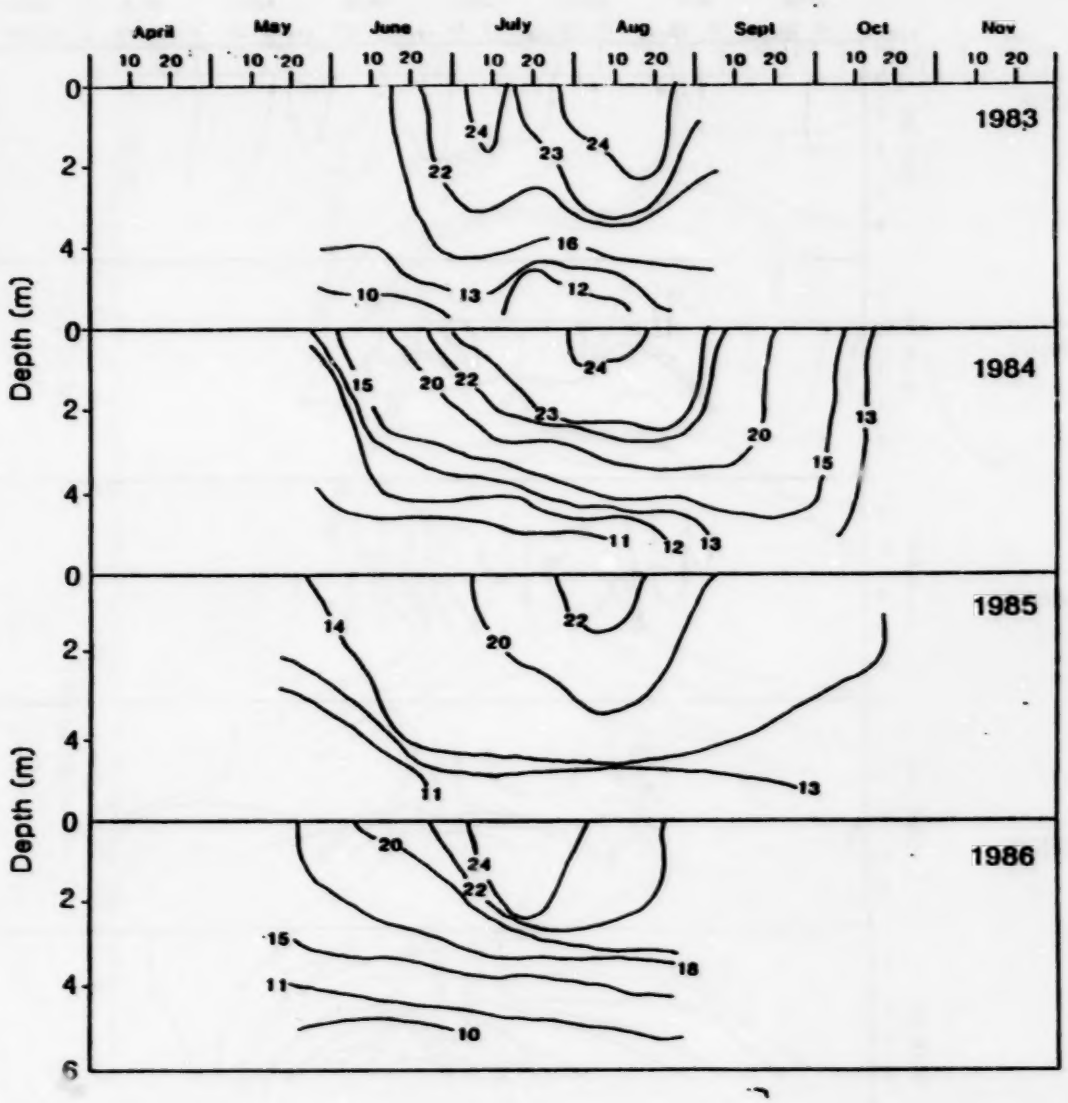

Figure 5b: Lake Aquitaine isotherms during the period 1983 to 1986.

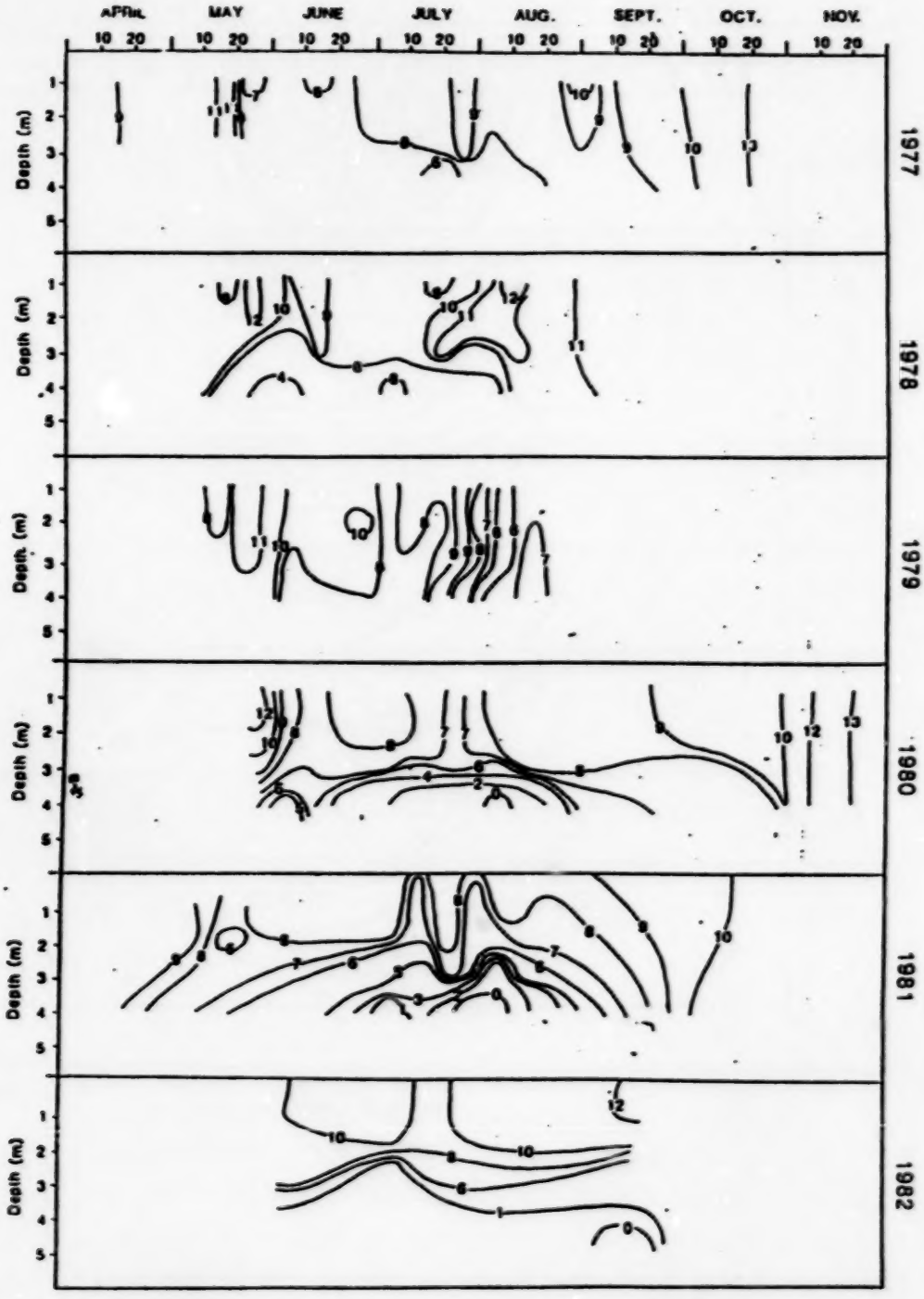

Figure 6a: Lake Aquitaine isopleths of oxygen during the period 1977 to 1982.

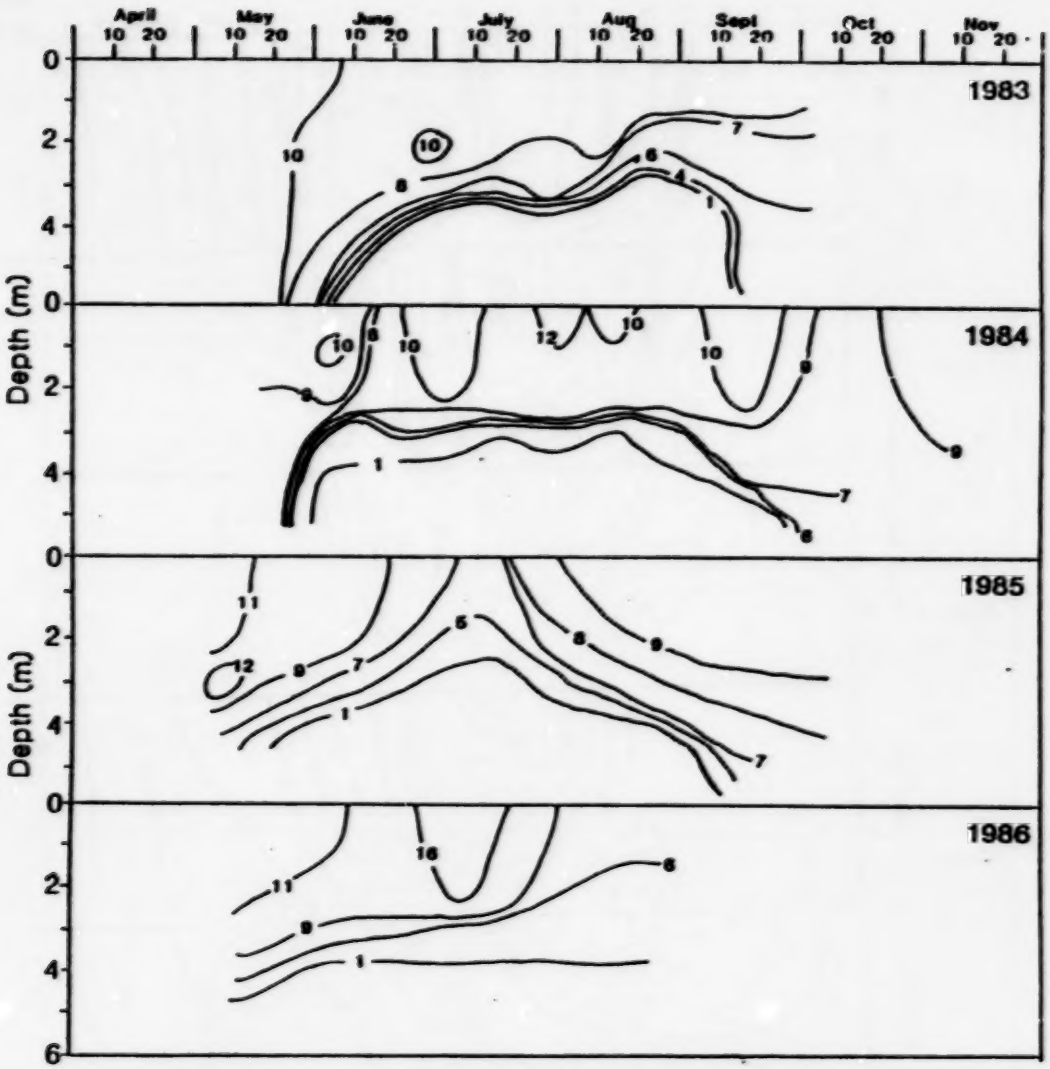

Figure 6b: Lake Aquitaine isopleths during the period 1983 to 1986.

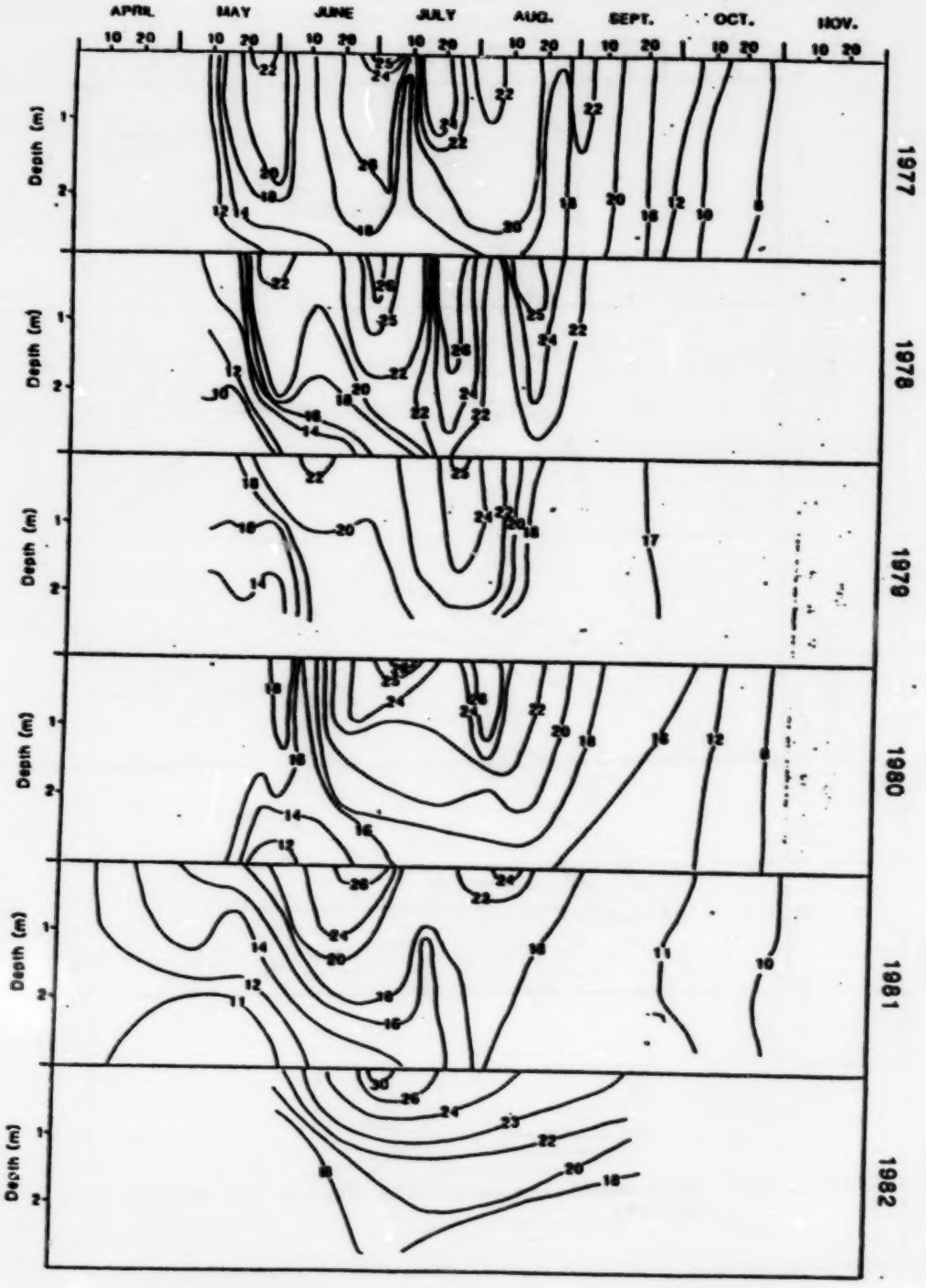

Figure 7a: Lake Wabukayne isotherms during the period 1977 to 1982.

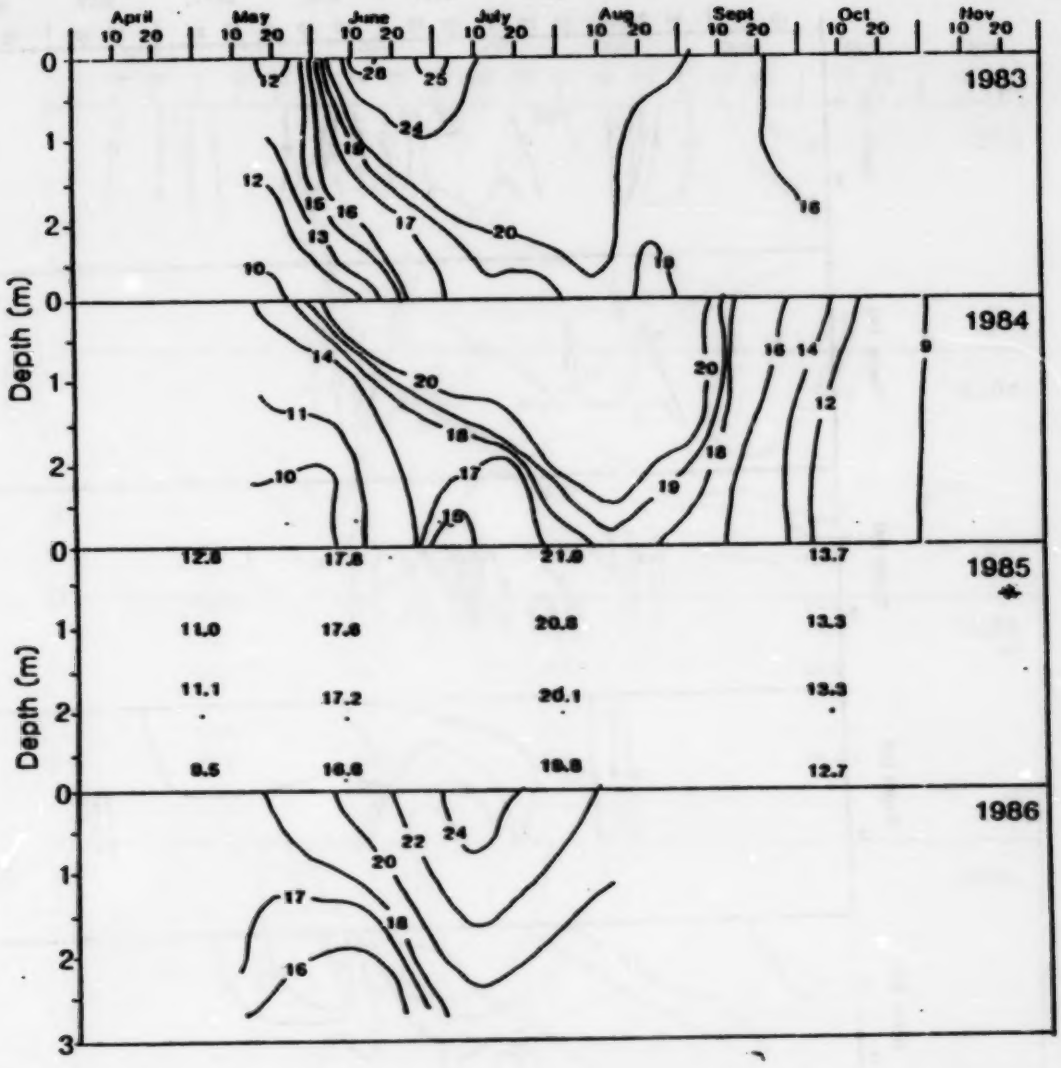

Figure 7b: Lake Wabukayne isotherms during the period 1983 to 1986. Note: * Insufficient number of samples to present isotherms. Temperature data for the four sample dates are shown.

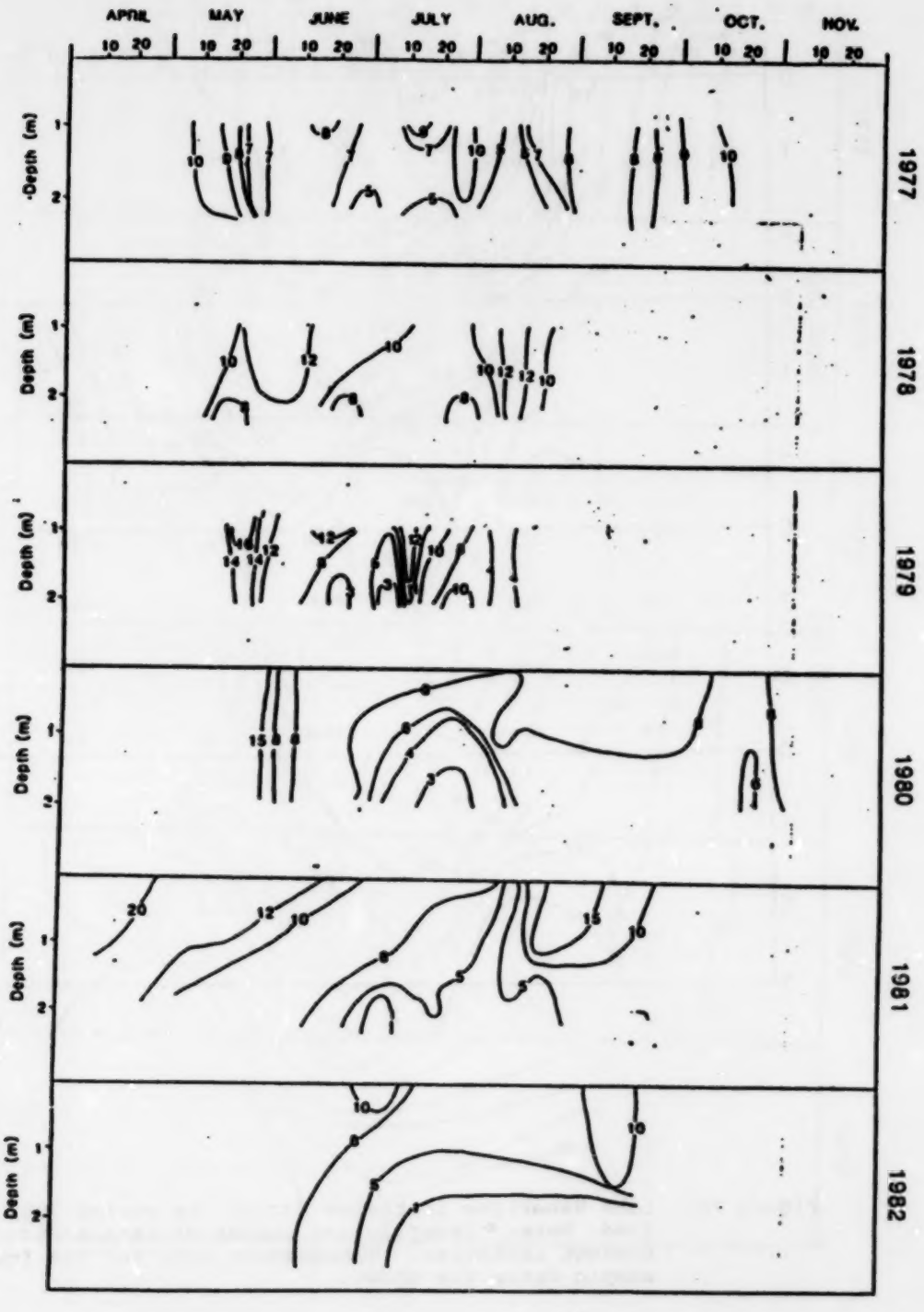

Figure 8a: Lake Wabukayne isopleths of oxygen during the period 1977 to 1982.

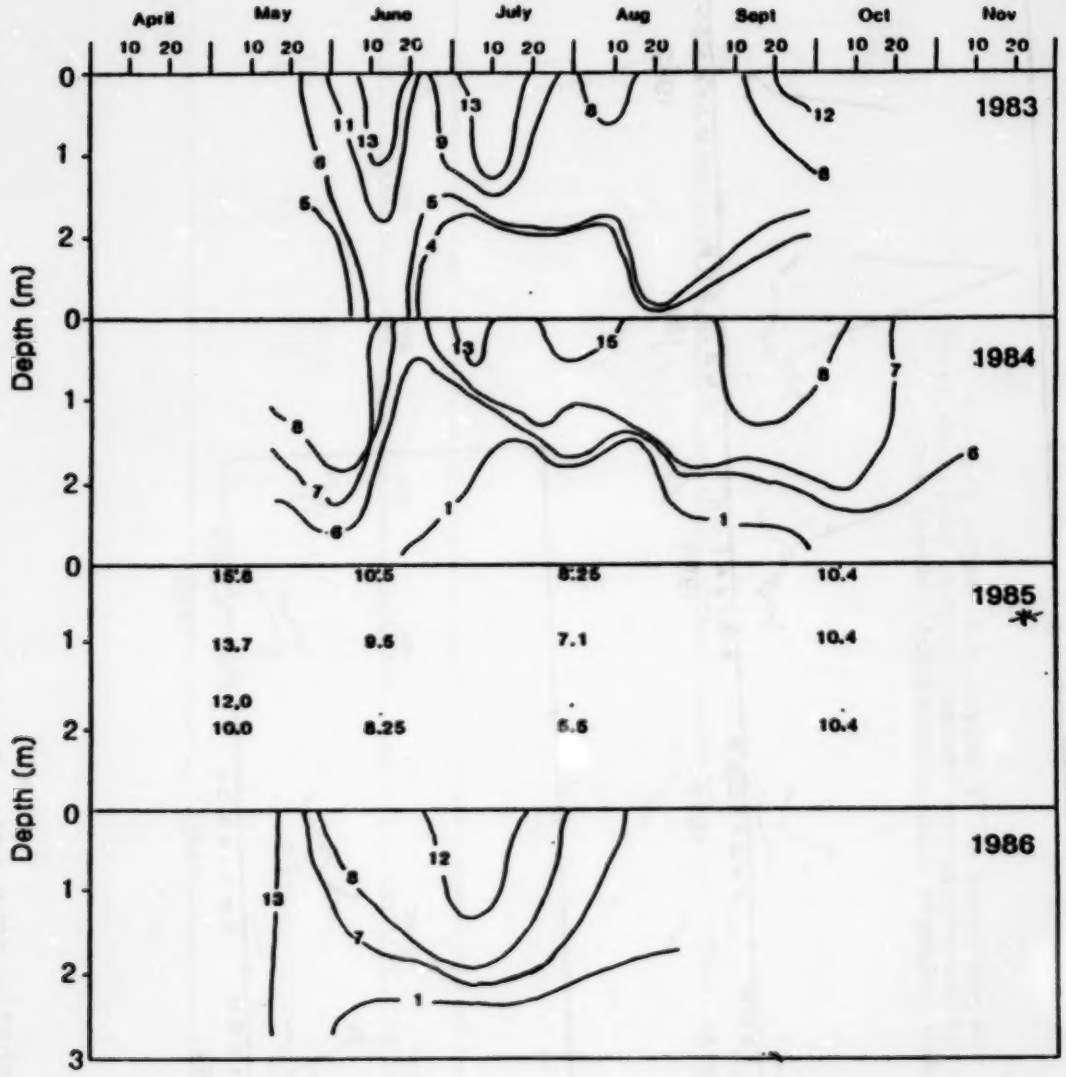

Figure 8b: Lake Wabukayne isopleths during the period 1983 to 1986. Note: *Insufficient number of samples to present isopleths. Dissolved oxygen measurements for the four sample dates are presented.

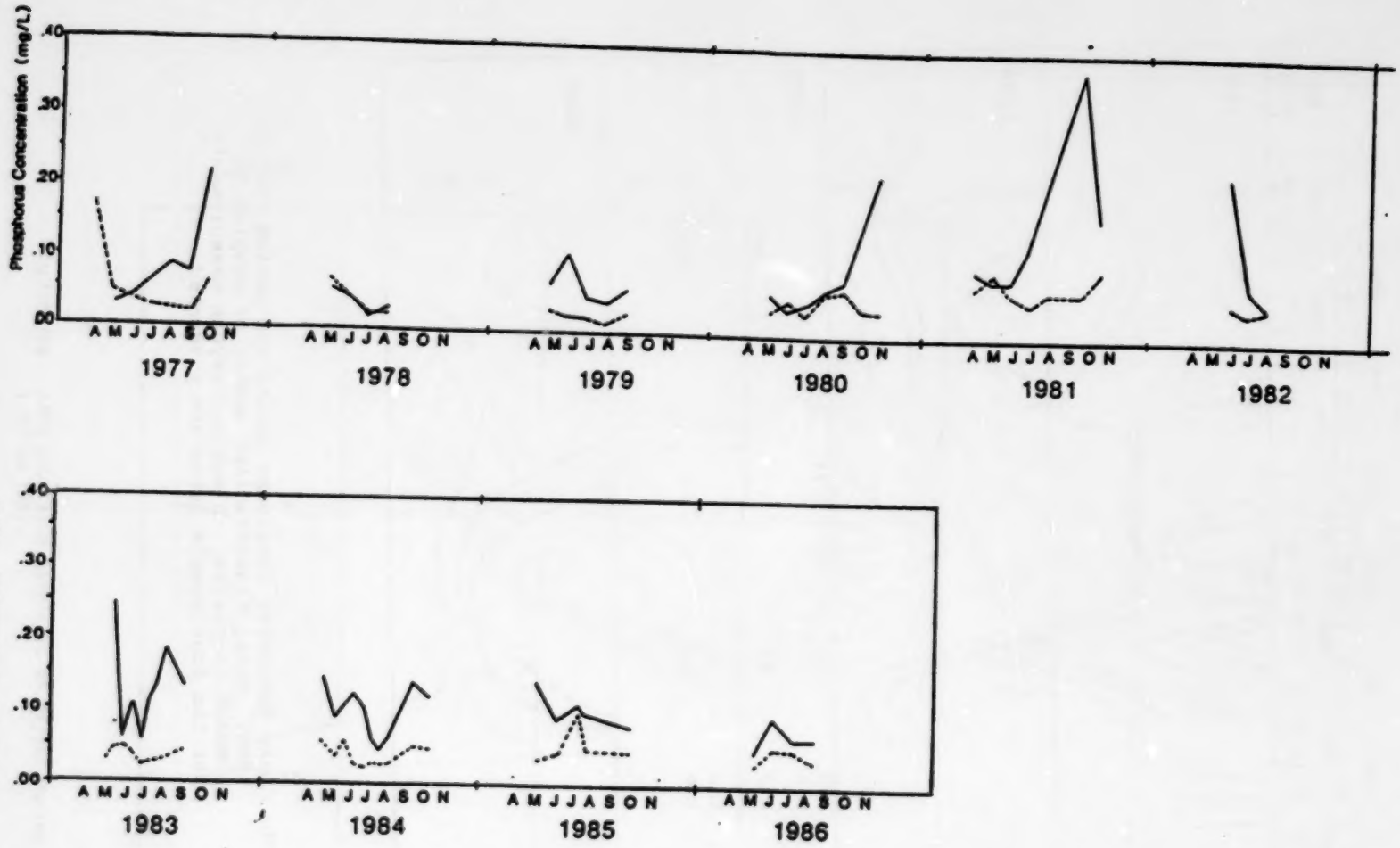

Figure 9: Seasonal euphotic zone total phosphorus concentrations in Lake Aquitaine (---) and Lake Wabukayne (___) during the period 1977 to 1986.

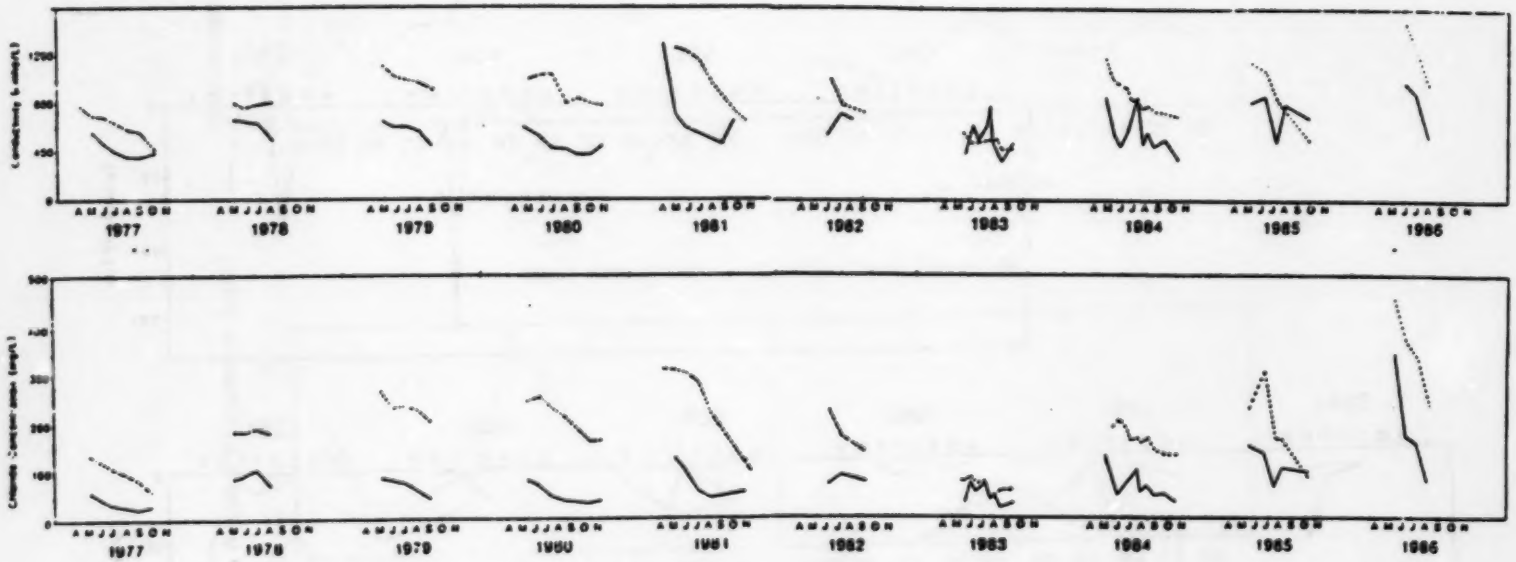

Figure 10: Seasonal euphotic zone conductivity (upper) and chloride concentrations (lower) in Lake Aquitaine (---) and Lake Wabukayne (___) during the period 1977 to 1986.

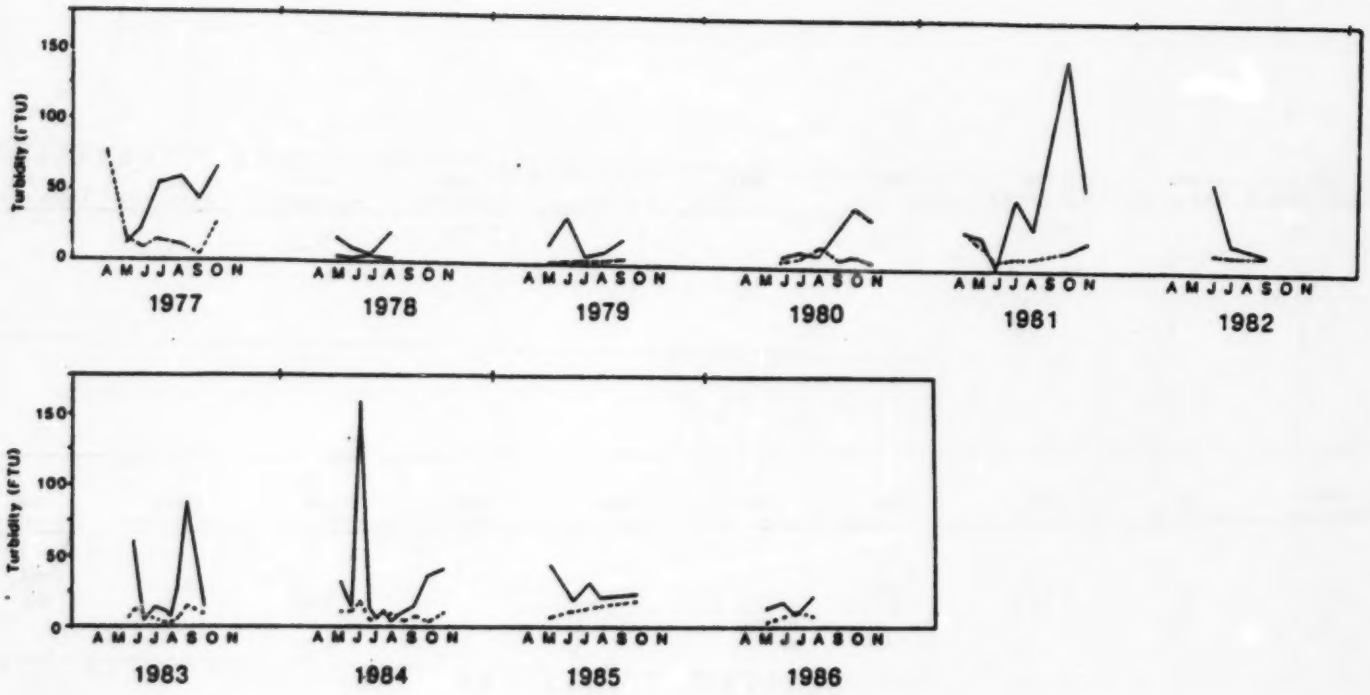

Figure 11: Seasonal euphotic zone turbidity in Lake Aquitaine (_ _ _) and Lake Wabukayne (___) during the period 1977 to 1986.

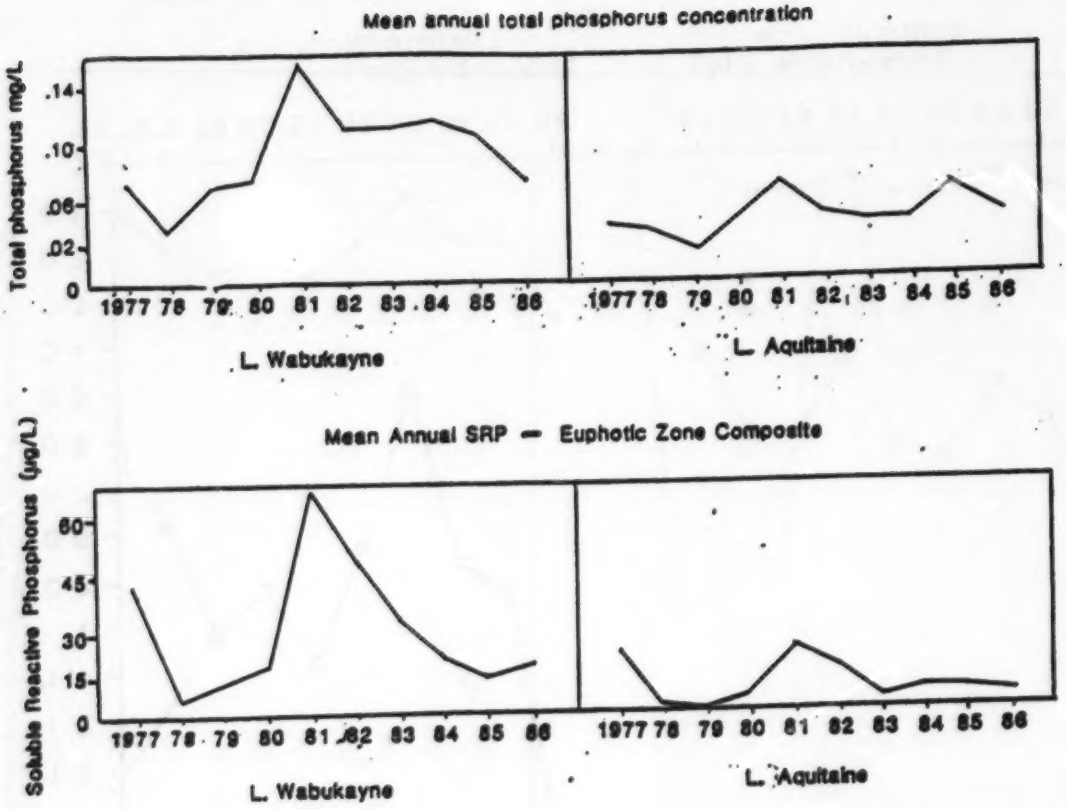

Figure 12: Mean total phosphorus (upper) and soluble reactive phosphorus (lower) in the euphotic zone in Lakes Aquitaine and Wabukayne during the period 1977 to 1986.

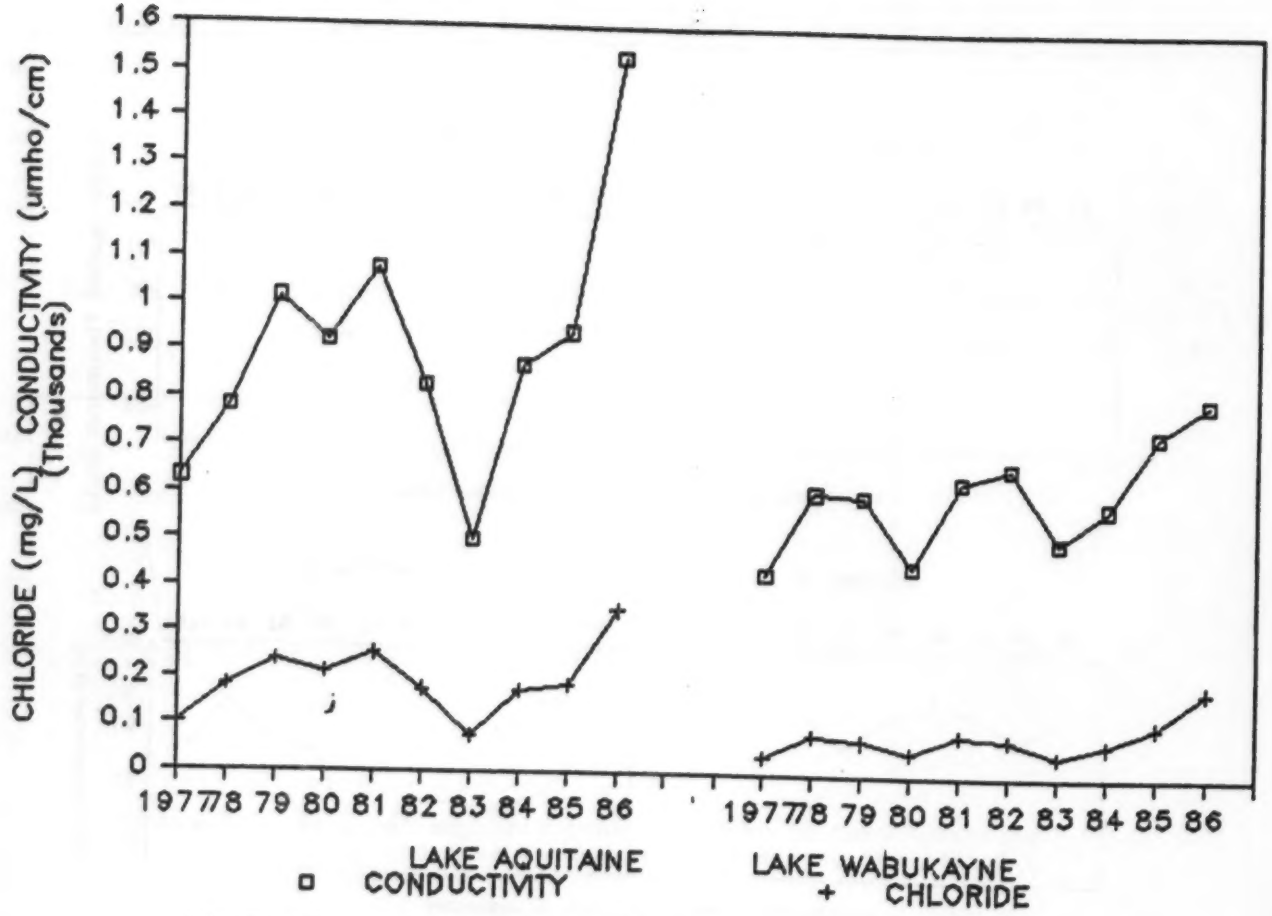

Figure 13: Mean conductivity (upper) and chloride concentration (lower) in the euphotic zone in Lakes Aquitaine and Wabukayne during the peri od 1977-1986.

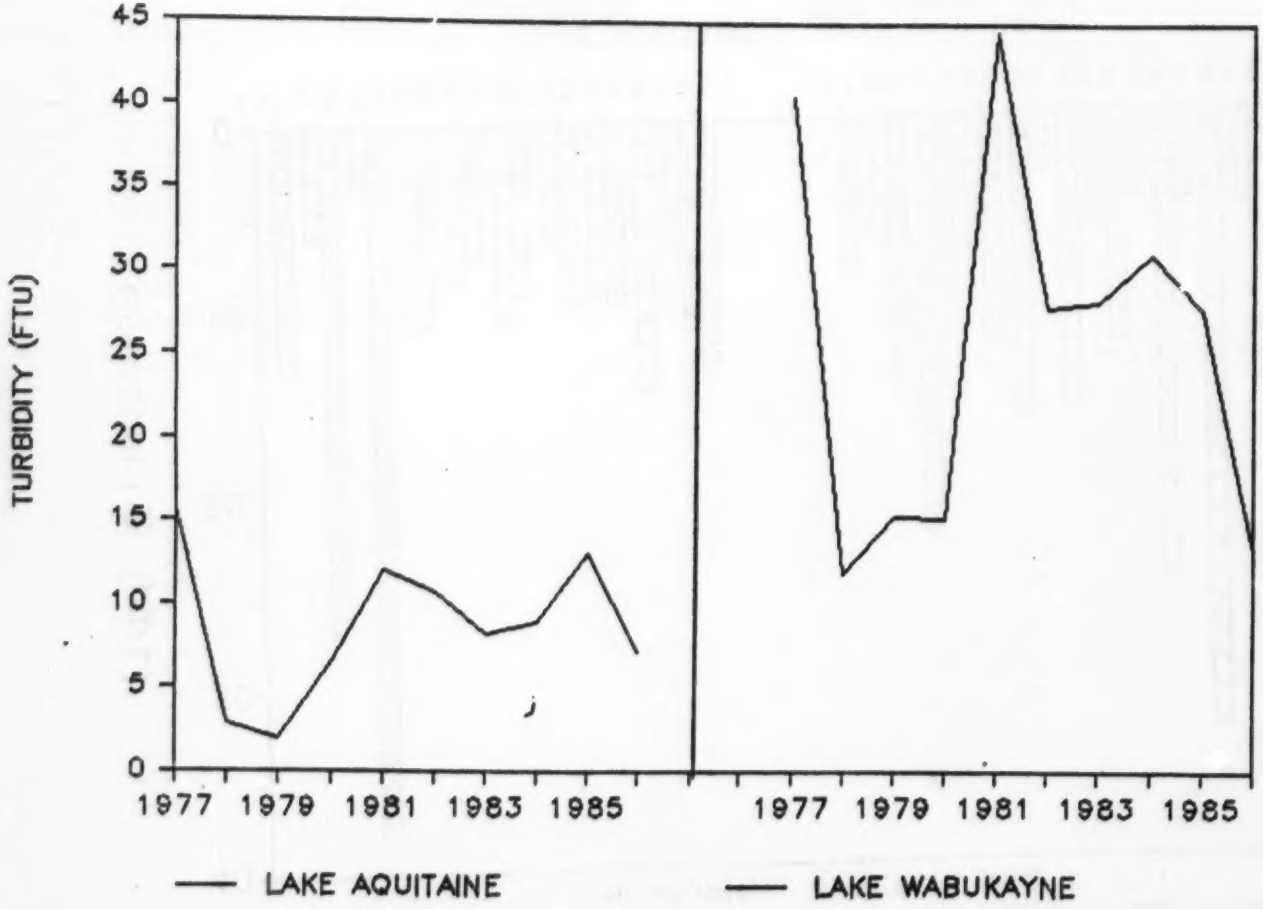

Figure 14: Mean turbidity in the euphotic zone in Lakes Aquitaine and Wabukayne during the period 1977 to 1986.

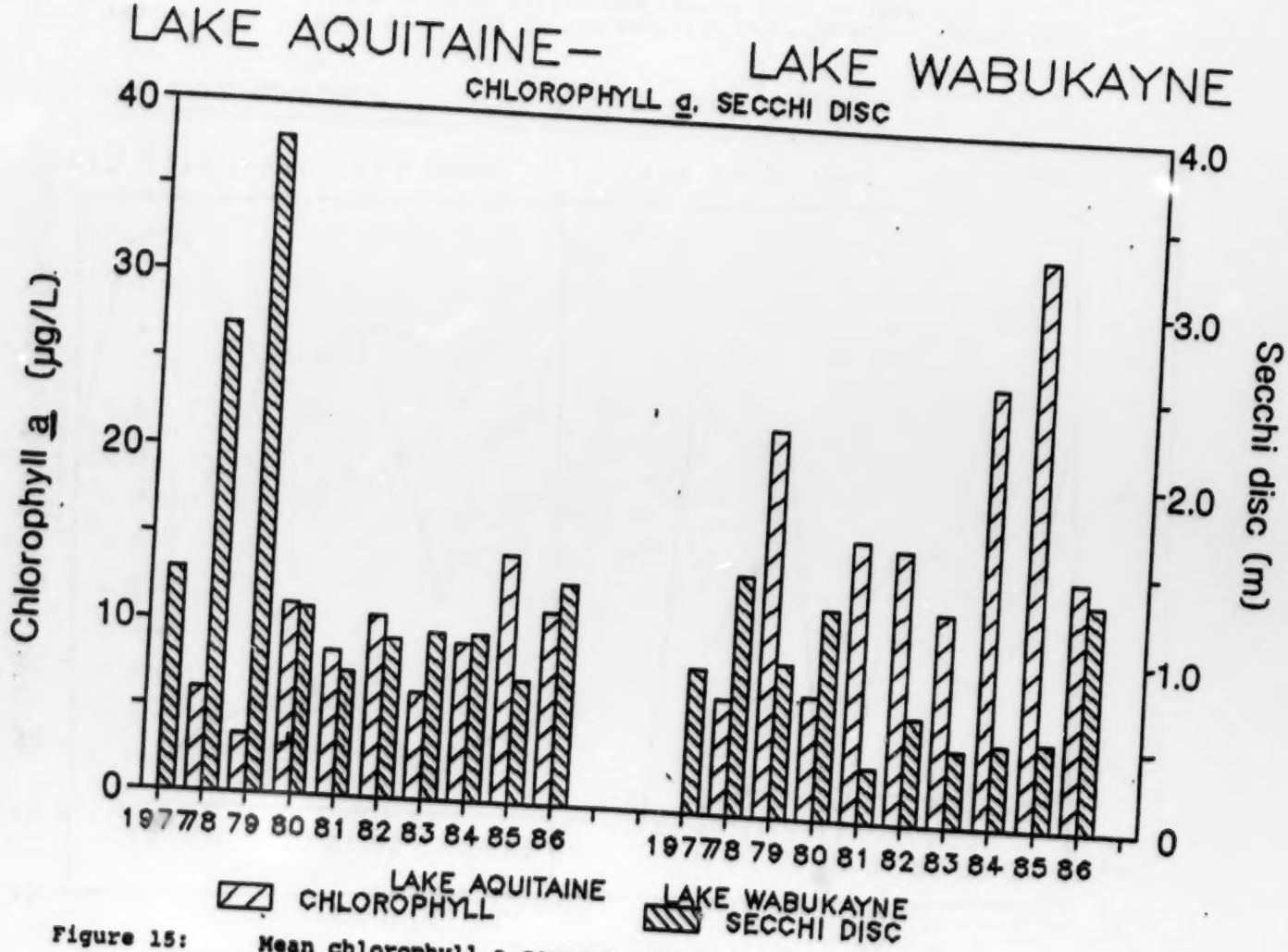

Figure 15: Mean chlorophyll a concentrations in the euphotic zone and mean Secchi disc depths in Lakes Aquitaine and Wabukayne during the period 1977 to 1986. Note: chlorophyll a concentrations not available for 1977.